



Reentered as second-class matter October 3, 1936 at the post office at Detroit, Michigan, under the Act of March 3, 1879. Trade Mark Registered U. S. Patent Office. Copyright, 1947, by Business News Publishing Co.

INSIDE DOPE

by GEORGE F. TAUBENECK

- Story of the Week
- Rare Specimens
- Unlucky Luck
- They Don't Pay Off on
Batting Practice
- Those Wonderful Dodgers
- Comedy of Errors
- Army Pride
- Sie Semper Diagnosticians
- Assault-and-Battery Excused
- What Are We Waiting For?
- Another Sports Story

Story of the Week

Harry Stuhldreher, quarterback of Notre Dame's "Four Horseman" and later football coach at Wisconsin, had bad luck as a coach for many years.

In the midst of his disastrous 1946 season at Wisconsin, a letter was published in a local newspaper suggesting that Harry be replaced by the coaches of two Madison, Wis., high schools (Edmore Academy and Madison East).

When Stuhldreher's eldest son, who was then quarterbacking the Madison West High team, read this letter, he blew up.

"Dad," he shouted, "I'm going to answer that bum's letter."

"Take it easy, son," soothed Stuhldreher, Sr. "It's all in the game."

"But the guy's nuts," fumed Stuhldreher, Jr. "It's my own coach at Madison West who ought to have your job!"

Rare Specimens

Joe DiMaggio's marriage to a glamorous Hollywood starlet had all the world and its Uncle Herman beaming with pleasure for awhile. But eventually there were rumors and gossip, and the marriage hit the skids.

In the 1946 campaign, Joe's hitting was off, no doubt because of his troubled mind. Late in August of that year a Hollywood character spied Joe chomping a double sirloin at "Toots" Shors. (Joe had gone four for the horse-collar that afternoon.)

"Hi, Joe!" greeted this Hollywooder. "Say, you got lotsa friends in moom pitchers. Everybody's talking 'bout your troubles out there. Some shmoes take her side, of course, but lots of us take yours." Carving off another slab of steer, Joe murmured politely:

"And maybe some odd characters are minding their own business?"

Unlucky Luck

"Hoot" Evers of the Detroit Tigers may be the champion hard-luck player of all time. He was the hottest rookie in major league baseball during the spring-training season of 1946—and then he broke a leg.

Restored to the line-up in mid-summer, he made a "college try" for a Texas-leaguer, crashed into Eddie Mayo, and wound up in the hospital for many long weeks. And just as he was beginning to hit his stride in 1947, he was "beamed" by a murderous fast-ball, and went back to Henry Ford hospital again.

After he recovered consciousness and after his sharp headaches had diminished, he was told that another Detroit player, pitcher "Diz" Trout, who occupied a room on the same floor of that magnificent hospital, was eager to entertain him.

"Hoot" accepted the invitation with pleasure.

The gregarious Trout had already assembled five bosom friends, and suggested that a poker game might

(Concluded on Page 12, Column 1)

S. Carolina Mfrs. Ask Delay on Bill Requiring Cooling

COLUMBIA, S. C.—A subcommittee of the State House of Representatives which is now studying a bill requiring South Carolina textile mills to install air conditioning equipment has been asked by the South Carolina Cotton Manufacturers Association to recommend that action on the proposed measure be postponed for at least a year.

Frank Watkins, counsel for the SCCMA, told the subcommittee at a recent public hearing that association engineers looking into the matter will need at least another year to bring in a complete report. He said the equipment would cost some mills \$1,000,000.

Earl Taylor and Jessie Mitchell, South Carolina officials of the Textile Workers Union of America (CIO), stated they would submit a brief outlining facts favoring the bill.

The proposed measure, House Bill 19, was introduced in the House last January and referred to the Committee on Commerce and Manufacturers. The bill was not acted upon during the 1947 session, but the subcommittee was appointed to study and report on it at the next session of the legislature in January, 1948, and was voted funds to conduct public hearings and survey state textile plants.

The bill states, among other things, that no textile-mill employee shall be required or permitted to work in any room where the relative humidity is higher than 80% or where the temperature is raised higher than 85° by heating devices. This is qualified by the provision that the work room

(Concluded on Page 6, Column 5)

43rd Convention of ASRE Begins Dec. 8

ATLANTIC CITY, N. J.—The 43rd annual meeting of the American Society of Refrigerating Engineers will be held in Atlantic City Dec. 8 to 10, it has been announced by R. H. Money, president of the society. Headquarters of the meeting will be the Hotel Traymore.

Some of the highlights of the three-day session will be papers presented by J. N. Lemon, chief of technical research of the U. S. Department of Interior on fish freezing at sea; S. W. Brown, chief engineer of the marine department of Carrier Corp., will discuss mechanical developments in marine refrigeration; and L. C. Marshall, division of electrical engineering at the University of California, speaks on technical factors in greenhouse air conditioning.

A few of the other topics to be covered on the program will include papers on refrigeration as applied to concrete dams, storage of edible nuts, and papers on the heat pump.

Although the convention does not officially open until Monday, Dec. 8, a number of committee meetings and advance registration are scheduled for Sunday afternoon, Dec. 7.

The Philadelphia section of the society will act as host for the occasion, with plans for other entertainment features now under way.

G-E Names C.M. Rowland To Newly Created Post

BLOOMFIELD, N. J.—C. M. Rowland has been named sales manager of the newly created Commercial Refrigeration Distributor Division of the General Electric Co.'s Air Conditioning Department, according to a recent announcement by G. R. Prout, vice president and general manager of the department.

Mr. Rowland, who will make his headquarters at Bloomfield, N. J.,

(Concluded on Page 4, Column 4)

Refrigerators In Lead By Far In Dollar Volume

West Penn Power Reveals Breakdown In Appliance Sales by Retailers

PITTSBURGH—Consumers in the area served by West Penn Power Co. plunked down \$7,000,000 for appliances during the first seven months of this year, with by far the largest percentage being spent for household refrigerators, the utility reported. Home freezers also showed a substantial gain.

A breakdown of appliance sales in dollar volume for the 1947 period, based on dealers' reports, reveals that 28.4% was claimed by refrigerators. This was 2.8% more than the 25.6% spent on refrigerators in the 1946 period.

Lighting equipment took the second largest share of the appliance dollar in West Penn's territory. However, the share in the 1947 survey period (13.3%) was 6.1% less than it was in the comparable 1946 period (19.4%).

But in spite of this percentage decrease

(Concluded on Page 4, Column 5)

California Law on Dairies' Equipment Selling In Effect

SAN FRANCISCO—Z. E. Jones, secretary-manager of the Refrigeration Contractors Association of Northern California, said his organization will seek to arrange a meeting with the Dairy Institute and the State Department of Agriculture to discuss the application of California's new "ice cream" law.

The law, which became effective Sept. 19, forbids any manufacturer or distributor of frozen dairy products to sell refrigeration equipment at less than the manufacturers' published retail list price. However, the act permits the rental of such equipment under certain conditions.

Since it is a part of the State's agricultural code, the new law will be administered by the market enforcement division of the Agriculture Department. Under the measure, the department is to conduct a survey

(Concluded on Page 32, Column 3)

Fear Freight Rate Boost Might Jump Appliance Prices

NEW YORK CITY—Appliance and radio distributors here fear that possible higher freight rates may be "the straw that broke the camel's back" in the efforts of producers of appliances and radios to hold the price line.

One executive of a retailing chain declared that "in general conversations with suppliers, dealers are getting the build-up which on many occasions in the past has been the prelude to possible price increases."

The Interstate Commerce Commission now has under consideration petitions from the railroads for an immediate 10% increase in freight rates.

When Stewart-Warner Corp. gave its recent guarantee that prices would not be increased for 60 days it emphasized that it could not extend the guarantee because of the possibility of increased freight expenses and other costs.

Right on the heels of the Stewart-Warner announcement the home radio division of Westinghouse Electric Corp. issued the following statement:

"It is most unlikely that we will announce a price increase on home radios during the next 60 days. The possible effects of freight rate increases are being studied but no decision can be reached until actual rate increases are announced."

First In New Chain Of Reconditioning Plants Set To Open

SHERMAN OAKS, Calif.—A nationwide chain of 10 household refrigerator reconditioning plants is what Herman Hantober has on the agenda for 1948.

Formerly head of the Associated Refrigerator Plant, a Philadelphia reconditioning firm, Mr. Hantober is scheduling the first of his used refrigerator depots for a Philadelphia opening sometime around the beginning of 1948.

He plans to channel most of the used refrigerators to foreign markets.

At present the head of Hanmar Co., Inc., a local distributor of commercial equipment, Mr. Hantober is also drawing up plans to resume publication of *National Refrigerator*

(Concluded on Page 32, Column 1)

Locker Builders Seek New Ways For Expansion

Financing Barriers Hit; Higher Charges, Longer Terms To Be Sought

By C. Dale Mericle

KANSAS CITY, Mo.—Major problem confronting the locker plant industry today is that of financing the construction of new plants.

This was the chief concern of contractors and manufacturers attending the annual conventions of the Frozen Food Locker Institute and the National Frozen Food Locker Association here last week.

Nearly 2,500 members and guests, according to official estimates, attended the meetings and viewed the exhibits of some 100 manufacturers and suppliers in the arena of the Municipal Auditorium. The attendance figures set a new record.

Continued growth of the industry is indicated by the 1,500 new plants which were installed last year, according to Ray Farquhar, executive director of F.F.L.I. Government figures, he said, showed 8,025 locker plants as of July 1, 1946, and 9,529 on July 1, 1947.

Despite this growth, however, construction of new plants has fallen 50% in the past year, he pointed out.

Chief cause of this drop is the reluctance of banks, insurance com-

(Concluded on Page 27, Column 3)

Bendix Allows Assembly In Mexico To Avoid Ban

SOUTH BEND, Ind.—Assembly of Bendix automatic washers in Mexico will be underway in November to overcome the embargo on home appliances placed in effect July 11, according to Harlow K. Lyons, export manager for Bendix Home Appliances, Inc.

Distribuidora Mexicana, S.A., in Mexico City, has been given a contract to make panels and other parts for the washers and to install them on the chassis which are shipped duty-free from the United States. Approximately 300 units a month will be completed in Mexico City, Mr. Lyons said.

Negotiations for the assembly of Bendix automatic washers in Mexico were underway when the Mexican government announced the embargo. Postwar Bendix automatic washers have been shipped into that country since spring of 1946.

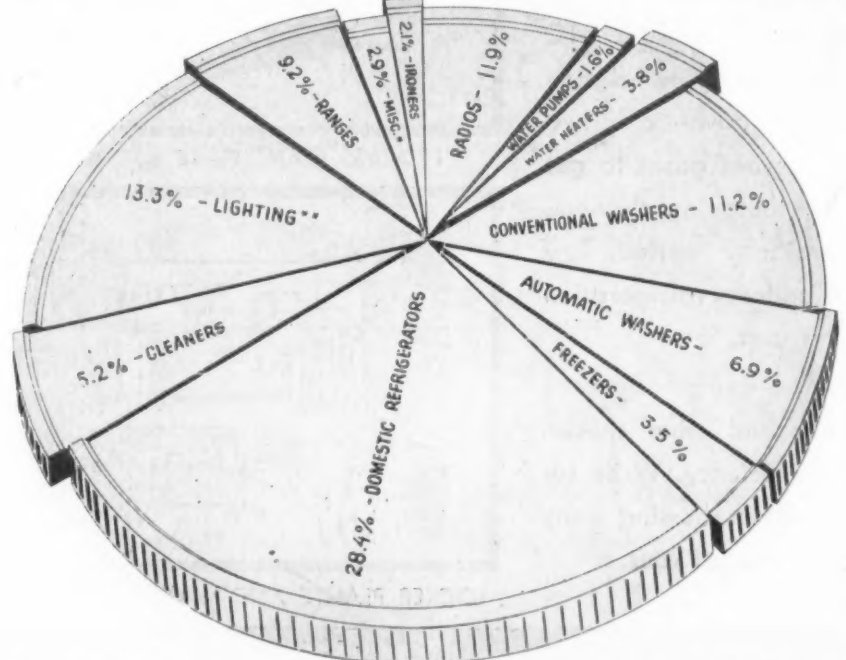
Machine Tool Builders Signify Intent To Use More Air Conditioning

CHICAGO—Twenty-four production plants, 99 offices, and 56 engineering departments of 643 companies surveyed recently by the national Machine Tool Builders Association plan to install air conditioning equipment this year, according to the association.

This and other survey findings were announced at the recent National Machine Tool Show here to bear out the belief that the machine tool industry is either in a boom now or on the verge of one. The show, the first of its kind in 12 years, was staged in the Dodge-Chicago plant by the association.

According to the group, the survey showed that among other things the companies consulted expect the business level next year to be 21.4% higher than it is this year and intend to buy 8,669 tools in 1947.

How the 'Appliance Dollar' Was Spent



This is how the domestic customers on the power lines of the West Penn Power Co. cut up the dollar they spent on electrical appliances and fixtures in the first seven months of 1947, according to reports received by the utility from dealers. (West Penn supplies electric power to more than one million people in northern and northwestern Pennsylvania.)

Wisconsin Association Indicates Desire To Hold Credit Terms at Reg. W Levels

MILWAUKEE—Credit terms extending 18 months are liberal enough for appliances, members of the Wisconsin Radio, Refrigeration, and Appliance Association agreed at a recent round table discussion of the subject here recently.

Terms required by Regulation W at the present time are sufficiently liberal, they believe, including the 20% down payment. Some expressed disapproval of lengthening the terms to 36 months as has been suggested by some lending institutions.

Purpose of the round table discussion, attended by appliance dealers, wholesalers, and representatives of some lending institutions, was to work toward forestalling any trend to excessively liberal credit terms after Regulation W passes out of the picture on Nov. 1.

To this end, a "credit committee" was formed to meet with local bankers and other lenders, and the Wisconsin Furniture Dealers Association, to work out a common policy on credit terms, trade-in allowances, and other sales policies on appliances.

One method suggested to keep credit terms in line was to compile a "rate chart" covering unpaid balances. The chart would allow shorter terms on small balances and longer terms on large ones.

Only on multiple purchases where the total cost of the appliances precluded the feasibility of the customer paying for them within 18 months, were longer terms considered advisable.

However, the fear was expressed that if longer terms were permitted, they will become the rule rather than the exception because "the public always wants the longest time possible to pay."

Representatives of finance companies present tossed the policy decision on credit right into the laps of the dealers. One declared, "Lending institutions prefer the more stringent, business-like terms of Regulation W, as it reduces losses. We want you to recommend to us the terms you prefer to work under. We could then establish a 'rate chart' and thereby forestall those long term contracts which were so evident before the war."

The finance men also told the dealers that the credit problem would be a long way toward solution if each dealer would keep his own house in order by not offering longer credit terms or more liberal trade-in allowances just to get a customer away from a competitor.

Howard Ashworth, secretary of the appliance men's association, asserted that, on the basis of reports reaching his office, "confusion in the appliance industry is apparent, and some retailers already are offering liberal trade-ins on radios in an effort to move them off their floors."

"The more levelheaded dealers are now seeking ways and means of preventing a return to the prewar evils of excessive trade-in allowances and ultra long terms, all of which go to break down an industry."

Stewart Warner To Hold Radio Prices 60 Days

NEW YORK CITY—Stewart Warner Corp. has pledged itself not to raise prices on its radios or television sets for the next 60 days. Announcement of the moratorium on price rises was made by Samuel Insull, Jr., manager of the radio division, at a meeting of eastern distributors, held here recently.

Declaring that the "company cannot extend its guarantee beyond that period," Mr. Insull cited possible freight rate increases and other rising costs.

Bertha Will Represent Filtrine In Texas Area

BROOKLYN—Filtrine Mfg. Co., manufacturer of water coolers and filters, has appointed James A. Bertha as its representative in Texas, with headquarters at Houston.



J. A. Bertha

Mr. Bertha has had extensive experience in the sale of refrigerating equipment, having served as district manager in southeast Texas for the Kelvinator Division of Nash-Kelvinator. Formerly of Indiana, where he attended Purdue university, he has resided in Texas since 1931.

Hotpoint Urges Freezer Dealers To Plan School Lunch Demonstrations

CHICAGO—School lunch demonstrations during the months of September and October will both extend the peak selling season for home freezers and increase the dealer's unit sales volume according to a recent study completed by Hotpoint, Inc.

In a bulletin to the company's field organization, Leonard C. Truesdell, vice president of marketing for Hotpoint, said, "recent tests have shown that one of the least exploited sales potentials of the home freezer is its value in conjunction with the home preparation of school lunches."

With the current emphasis on balanced luncheon diets for school children," he continued, "store demonstrations on how home freezers will enable the mother to add variety to the menu, as well as eliminate last minute lunch preparation every day, provide a perfect tie-in with September and October back-to-school shopping."

According to tests conducted by the Hotpoint Institute, complete weekly menus consisting of sandwiches, cup cakes, cookies, apple sauce, and fresh fruit cups can be prepared and packaged in a few hours one morning—placed in the home freezer—and forgotten until lunch packing time rolls around next week or the week following. While sandwiches may be frozen for longer periods, the home economists discovered that two weeks was about maximum for top flavor and texture.

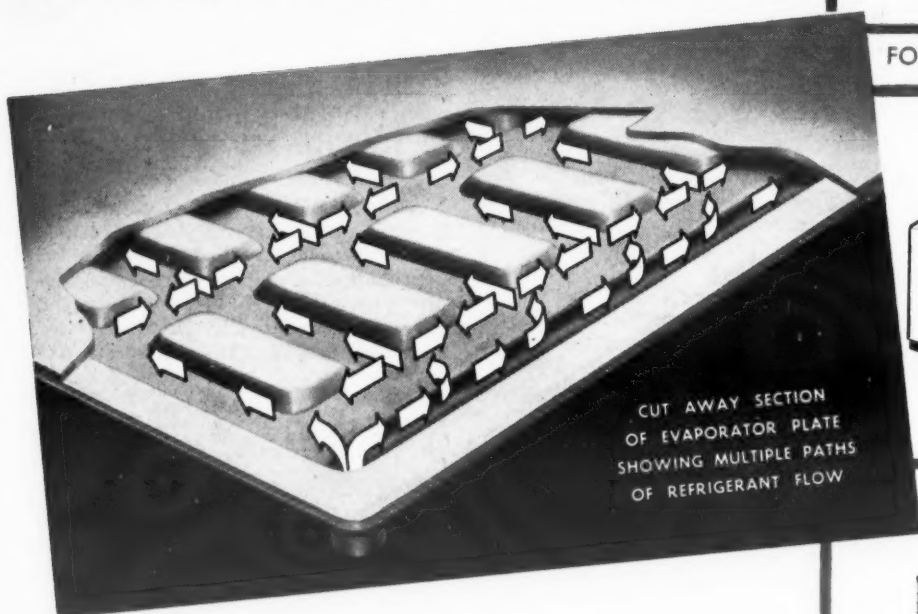


Demonstrator stores a week's lunches.

Especially adaptable for school lunch home freezer demonstrations, Truesdell said, "are meat, poultry, and fish sandwich fillings and certain types of sandwich spreads. Jelly, jams, and fillings that include egg white should be avoided in the demonstrations," he continued, "since these spreads do not return to their original palatability upon thawing."

According to the findings of the Hotpoint Institute, the housewife may be told that cup cakes will retain their original freshness when frozen from four to eight months while fruit cups, applesauce, and other fruits may be frozen for indefinite periods of time.

BTC EVAPORATOR PLATES FOR Every REFRIGERATION APPLICATION



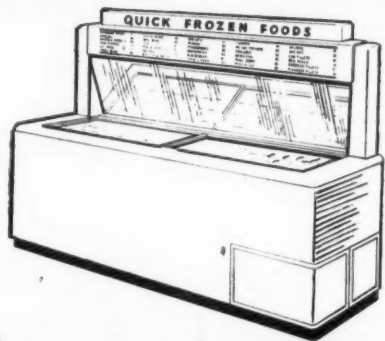
CUT AWAY SECTION OF EVAPORATOR PLATE SHOWING MULTIPLE PATHS OF REFRIGERANT FLOW

Whatever the commercial or technical application, BTC Evaporator Plates can achieve results not possible with other plates. Ordinary coil or tube plates permit the refrigerant to flow in only one direction. BTC Evaporator Plates with the exclusive "Cross Flow" design have multiple paths for the refrigerant flow—only two seconds travel is required for refrigerant gases to get out of the plate and back into the outgoing channel. This means all surfaces are constantly wetted, low pressure drop is encouraged and uniform refrigeration obtained . . . at lowest operating cost.

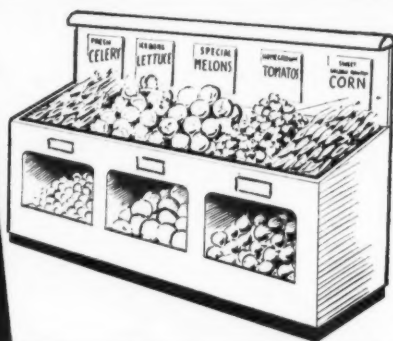
BTC Evaporator Plates can also be easily fabricated into "L", "U", "Step", "Cylindrical", and other special forms without impairing efficiency. Write for your copy of illustrated Bulletin showing many applications for BTC Evaporator Plates.



THE BREWER-TITCHENER CORPORATION
CRANDALL-STONE DIVISION . . . BINGHAMTON, N. Y.



FOOD FREEZERS, CABINETS, COOLERS



COUNTER OR SHELF DISPLAYS



PROCESS PLANT PLATE ASSEMBLIES



LOCKER PLANTS AND WALK-IN COOLERS

Jahco Declares Dividend of 50 Cents, Payable Oct. 1

CLEVELAND—Board of directors of Jack & Heintz Precision Industries, Inc., has declared a dividend of 50 cents per share on the outstanding shares of the company's cumulative preferred stock, 4% series, payable Oct. 1, 1947.

The board took no action on the payment of dividends in arrears for the first three quarters of 1947. After the payment of the Oct. 1 dividend, arrears will amount to \$1.50 per share, or an aggregate of approximately \$105,000.

C. Thomas Jeter Appointed Sales Manager at Nelson's

JACKSON, Miss.—Nelson's, Inc. here has announced recently the appointment of C. Thomas Jeter as sales manager.

Mr. Jeter has had more than 18 years experience in the fields of refrigerating, heating, and ventilating, and during the past two years has been power consultant to the Mississippi Power & Light Co.

Selma M. Andrews Named To Head Hotpoint Institute

CHICAGO—Selma M. Andrews has been named director of Hotpoint Institute, appliance research and test center and use-value training headquarters for Hotpoint, Inc., Edward R. Taylor, merchandising manager, has announced.



Selma Andrews

Broadening its use-value training program, the institute, under Mrs. Andrews' guidance, will be a major factor in training the company's sales personnel to meet the demands of the company's several million dollar expansion and merchandising program, Mr. Taylor said.

Training classes in the use of new appliances, with the men actually preparing foods and laundering clothes, are being organized to include all key personnel in the field organization and distributors' group.

QUALITY BUILT THROUGHOUT

STAINLESS STEEL
REACH-IN REFRIGERATOR

DRY BEVERAGE COOLER

For Beauty **CROWN**
For Construction . . . **CROWN**
For Economy **CROWN**

CROWN manufactures a complete line of the finest commercial refrigeration equipment. Our superior craftsmanship assures perfect performance.

- REACH-IN REFRIGERATORS
- BEVERAGE COOLERS
- FROSTED FOOD CASES
- FREEZERS
- DISPLAY CASES
- ICE CREAM CABINETS

**IMMEDIATE DELIVERY
DISTRIBUTORSHIPS AVAILABLE**

Crown REFRIGERATOR CORP.
FACTORY & NATIONAL SALES OFFICE
METUCHEN, NEW JERSEY
EXPORT DIVISION: 154 NASSAU ST., NEW YORK 7, N. Y.

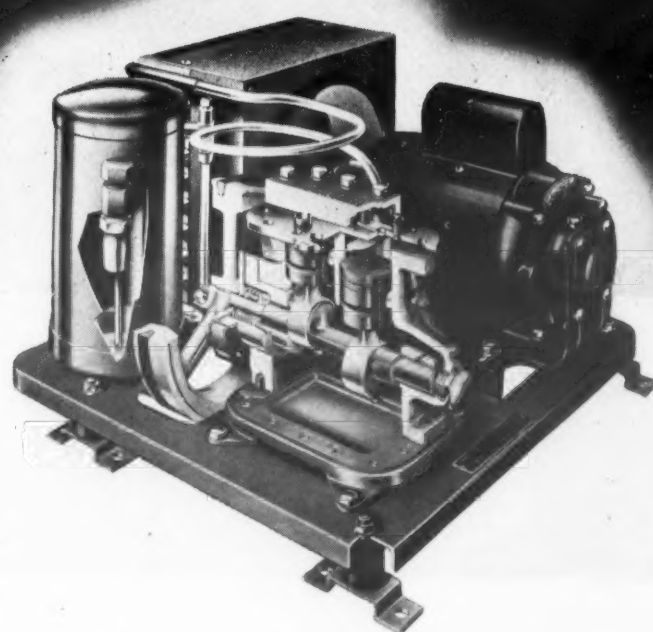
Meet the Better Half



Dorotha L. Gossett
J & H Associate,
Refrigeration Division

Jack and Heintz announces

an important addition to its line of better, precision-built condensing units. The new J & H $\frac{1}{2}$ horsepower model fills the need of the refrigeration industry for a compact, light-weight unit for applications requiring more than $\frac{1}{3}$ hp. and less than a heavy duty $\frac{1}{2}$ hp.



Better condensing units
through
JACK & HEINTZ
Mass Precision

JACK & HEINTZ PRECISION INDUSTRIES, INC., Cleveland 1, Ohio

Steel Ingot Production Still Far Behind Demand

NEW YORK CITY—Although recent steel ingot production was well above the low level caused when a wildcat strike on the Union Railroad closed Carnegie-Illinois Steel Corp.'s plants, demand is reported to still be in excess of either production or shipments.

Sheet, small-size bar, plate, and structural consumers are all said to be seeking larger shipments. But, according to one source, sheet consumers hold faint hope for increased allocations during the remainder of this year.

"Foundries are short of pig iron and coke and there seems little likelihood of getting increased shipments in the very near future," this one source declared.

With the price of the steel-making grade unchanged in all leading districts, the scrap market seems to be holding up. Steel mills are reported to be staying out of the market in the apparent hope that prices will decrease.

Arbitrator Rules Out 1% Commission Boost For Appliance Salesmen

NEW YORK CITY—Major appliance salesmen of Bloomingdale's Department Store here, were held to be "fair and adequately" compensated, after appliance-salesmen members of the C.I.O. Department Store Employees Union asked for increases.

Rate-of-commission increases were denied major appliance and other salesmen by Arbitrator Sidney Wolff in the settlement. Mr. Wolff found that rates paid by Bloomingdale's to salespeople on straight commission are not out of line with other stores in the same situation and denied an increase of 1% in all appliance commission rates. The only change made for the benefit of the salesmen was to increase pro-rata on commissions from one sixth to one fifth.

The unusual arbitration finding, the first time that appliance specialty salesmen have "struck" for higher compensation in the form of larger commissions, points out that

most commission salesmen who apply themselves diligently to their jobs earn a better living than salaried employees, and that due to the extreme scarcity of major appliances and the pent-up demand every appliance salesman's "commission future" is more than bright.

Voltage Check Necessary When Installing Dryers

PITTSBURGH—Pointing out that efficient operation of electric clothes dryers hinges on proper voltage, the West Penn Power Co. has asked all dealers in its area to check with the utility before installing dryers.

The character of the electric load required by dryers may affect electric service in the homes of users and their neighbors unless adequate distribution facilities either exist or are provided, the utility explained.

The customer's electric service rate may be affected, it noted.

Although the dryers use an average of only 40 kw, it is the way they use it that makes checking necessary, according to the utility.

G-E Names Rowland--

(Concluded from Page 1, Column 2) was formerly manager of sales for the department's Packaged Cooling Equipment Division which was discontinued with the establishment of the new organization.

Established to consolidate the marketing facilities of the Air Conditioning Department and to provide commercial refrigeration distributors with coordinated services in selling through customer markets, the new Commercial Refrigeration Distributor Division will encompass market study and sales promotion, and will be responsible for sales of all products of the department to commercial refrigeration distributors. In addition, this division will be responsible for the full line of packaged cooling equipment which includes water coolers, beverage coolers, merchandising cases, and other specialized refrigerated cabinets.

Mr. Rowland has been associated with General Electric since 1935, and has been sales manager of the packaged cooling equipment division since 1939.

Refrigerators Lead--

(Concluded from Page 1, Column 3) crease, the utility pointed out, lighting equipment sales increased more than \$150,000 and accounted for nearly \$1,000,000 of the \$7,000,000 total.

"Similarly," West Penn explained, "while radios, conventional washers, and water pumps are not now taking as large a bite out of the appliance dollar as they previously did, the dollar volume produced by each of these appliances is considerably higher than it was in 1946. This is true of every item represented in the 1947 chart."

Despite the fact that radios and conventional washers are losing ground this year, they still rank third and fourth in dollar volume. Radios got 11.9% of the appliance dollar in the first seven months of 1947, compared with 15.9% last year, and conventional washers grabbed 11.2%, as against 12.9% in the 1946 period.

Besides refrigerators, gains over 1946 were also registered by ranges, water heaters, freezers, and automatic washers. The utility said this indicates that manufacturers have been able to step up production on these items.

By capturing 3.9% more of the appliance dollar during this year's period than they did in last year's, electric ranges led all other appliances in this respect. West Penn's breakdown shows that 9.2% of the 1947 appliance dollar went for ranges, compared with 5.3% of the 1946 dollar.

Water heaters also scored a good gain—2.2%. In the 1946 survey period, consumers paid out 1.6% of every dollar for heaters, but in this year's period the figure rose to 3.8%.

According to the utility, these figures disclose that ranges and water heaters, which were in short supply last year, "are fast rising to their rightful place as high dollar volume producers."

"Range sales increased more than \$400,000 during the 1947 survey period," West Penn noted, "while water heater sales showed an increase of \$200,000. Since supply is still far below demand on both these items, this trend should continue upward for a long time."

The utility reported an increase of 1.5% in the share of the appliance dollar going to freezers and a gain of 0.9% for automatic washers. Freezers grabbed 3.5% of the 1947 period dollar, compared with 2% during the 1946 period, and automatic washers took 6.9% this year, as against 6% last year.

Comparative percentages claimed by various appliances in the 1946 and 1947 periods and gains or losses follow:

Appliance	1947	1946	Gain or Loss
Domestic refrigerators	28.4%	25.6%	+2.8%
Lighting*	13.3%	19.4%	-6.1%
Radios	11.9%	15.9%	-6.0%
Conventional washers	11.2%	12.9%	-1.7%
Ranges	9.2%	5.3%	+3.9%
Automatic washers	6.9%	6.0%	+0.9%
Cleaners	5.2%	4.8%	+0.4%
Water heaters	3.8%	1.6%	+2.2%
Freezers	3.5%	2.0%	+1.5%
Miscellaneous†	2.9%	2.0%	+0.9%
Irons	2.1%	2.0%	+0.1%
Water pumps	1.6%	2.5%	-0.9%

*Sales of incandescent and fluorescent fixtures and portable lamps. Does not include bulbs and tubes.

†Sales of stokers, dishwashers, garbage disposers, food mixers, roasters, room coolers, clothes driers, and electric bed coverings.

Joking Butcher Requests Refrigerators, Etc. For Down Payments

PERRY, N. Y.—Paul Neff, a local meat market proprietor with a sense of both humor and horror over high meat prices, is offering to take refrigerator and durable goods as down payments on a pound of meat.

Tongue in cheek, Mr. Neff last week ran an advertisement saying that, for the convenience of his customers, "I have made arrangements with a finance company to take radios, electric refrigerators, cars, pianos, etc. (not older than 1946 models) as down payment on one pound of meat. Balance on easy monthly terms."

"If prices continue to rise, it will be necessary to charge customers just to look at the meat," Mr. Neff stated.

Moisture Content: Only Half a Gram per Cylinder!

(Less Than 10 Parts in a Million)



HALF A GRAM... that's scarcely moisture enough to seal an envelope... yet it represents *all* the moisture in a 145-pound cylinder of "Freon-12"—the safe refrigerant.

The amazing dryness of this refrigerant has made possible and practical new, low-temperature quick-freezers and frozen food storage units for household use and for locker plants. It has brought to a minimum the possibility of freezing in expansion valves or capillary tubes.

"Freon-12" dichlorodifluoromethane refrigerant has been noted for its extreme dryness ever since it first came into use. Today, it is practically anhydrous, containing *less than 10 parts of moisture per million parts of "Freon"*.

Because of the high quality of all "Freon" refrigerants, and because they are non-toxic, non-flammable and non-explosive, they are ideal for *every* type of commercial, industrial and household refrigerating requirement. Kinetic Chemicals Inc., Tenth and Market Sts., Wilmington 98, Delaware.



Inset above shows half a gram of water in eye dropper... the moisture content of a 145-lb. cylinder of "Freon-12".

OUTSTANDING FEATURES OF "FREON" SAFE REFRIGERANTS

1. Freedom from moisture... now less than 10 parts per million.
2. Narrow boiling point range—confined within limits of $\frac{1}{2}^{\circ}\text{C}$.
3. Less than 2% of air in vapor phase.
4. Freedom from acids. There are none in "Freon".
5. Freedom from high and low boiling products.
6. Non-toxic... non-flammable... non-explosive.

never before

has a nationally advertised

160 cu. ft. ALL-ALUMINUM WALK-IN

BEEN OFFERED AT SUCH AN AMAZINGLY LOW PRICE!

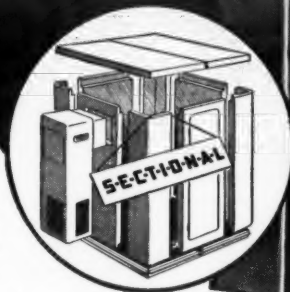
\$1000

YOUR
NET
COST

IMMEDIATE DELIVERY!
ONLY FRIGID-FREEZE
THRU MASS PRODUCTION
ECONOMIES CAN GIVE YOU
THIS UNUSUAL VALUE!

*\$1000 FOR 0° to +50° F.
\$1197.50 FOR 0° to -20° F.
F.O.B. Arlington, N. J.

- Ready to Plug-In,
Complete with
Self-Contained
Refrigeration Compressor
- Pre-Fabricated Sections
- Easily Assembled
- Installed in a Few Hours



EQUIPPED WITH KRAMER
THERMOBANK FOR AUTO-
MATIC DEFROSTING. NO
SCRAPING OF PLATES.

TEMPERATURES
AS HIGH AS
PLUS 50° F AND
AS LOW AS
MINUS 20° F

AVAILABLE
IN 6 SIZES
UP TO
730 CU. FT.

ONLY THE FRIGID-FREEZE
WALK-IN OFFERS THESE
EXCLUSIVE FEATURES:

Blast Freezing
Automatic Defroster
Fast Installation
Freezrol Modulator
(Thermostatic Temperature
Regulator)
Zero Sentinel
(Alarm System)
Thermo-Indicator
(Exterior Dial Type Thermometer)

Order by Wire, by Mail!

WITH THESE FRIGID-FREEZE FEATURES
—YOU CAN'T AFFORD TO DELAY!

NEVER BEFORE in refrigeration history has a \$1000 bill bought a package like this! Beautiful to look at—rugged in use, the Frigid-Freeze Walk-In is constructed of heavy-gauge all-aluminum inside and out—built to last a lifetime. There's plenty of headroom and plenty of storage space in this 160 cu. ft. giant that can be easily and quickly erected because it's pre-fabricated at the factory in sections. No blueprints, no carpenters, electricians or plumbers—no construction delays or hazards—the Frigid-Freeze Walk-In is assembled on the premises in a few hours with only a hammer and screwdriver. A patented locking device makes possible this speedy, simple installation and at the same time insures a perfect vapor seal between sections.

FOR UNMATCHED PERFORMANCE!

Condensing unit fits easily into place for continuous, unailing, economical operation at temperatures as low as minus 20° F and as high as plus 50° F, and is easily accessible for servicing. It's practically a "power-house on wheels." Completely assembled and tested at the factory, the refrigeration system, using FREON 12 refrigerant, is self-contained. Any layman can follow the simple instructions for setting-up. No adjustments, no expensive "hidden" costs, JUST WIRE TO THE NEAREST OUTLET for immediate use!

"EXTRAS"—AT NO EXTRA COST!

The Frigid-Freeze Walk-In has many built-in features not ordinarily found in cabinets priced considerably higher! KRAMER-THERMOBANK provides automatic defrosting at

specified periods and eliminates the fuss and nuisance of scraping plates. ZERO SENTINEL, an exclusive Frigid-Freeze feature operates independently of the electrical circuit. It's a mechanical soldier that guards against food spoilage by buzzing continuously and flashing a red warning signal. THERMO-INDICATOR, in full view on the outside panel, permits accurate reading at all times of inside temperatures. FREEZROL assures maintenance at all times of the desired degree of coldness. BLAST FREEZING insures fast pull-downs where sharp freezing temperatures of minus 20° F are required. What terrific value for such an amazingly low price!

FOR ICE CREAM—FOR FROZEN FOODS FOR DAIRY PRODUCTS

Whenever and wherever the problem of food storage arises, the Frigid-Freeze Walk-In provides the best

SPECIFICATIONS: All aluminum, heavy gauge, inside and outside. Exterior dimensions—6' x 6' x 7½'; Interior dimensions—5' x 5' x 6½'; Capacity 160 cu. ft. 6" of specially treated approved low-temperature, low-density insulation. Door and mechanism sections can be placed on any side. Motor—220 volts, 60 cycle, A.C. Shipping weight crated—2350 lbs. (Larger Sizes Also Available)

solution. It is the complete answer to such varied problems as the hardening and holding of ice cream; the freezing and storing of butter and of every kind of packaged or bulk frozen foods, such as meats, fruits, vegetables, poultry, seafoods, baked goods. For the most dependable preservation of food and for economical operation plus smooth efficiency, the Frigid-Freeze Walk-In is unquestionably the preferred equipment.

WE SAY—AND WE MEAN—IMMEDIATE DELIVERY

In addition to the primary applications mentioned above, this equipment has a great many other uses in many other markets, some of which are listed alongside. Scores of other markets will undoubtedly come to mind as a result of your own experience and contacts in the refrigeration field. Yes, there's a gold-mine of opportunity waiting. But no need of waiting on your part. Order now—and your Walk-Ins will be on the way to you at once.

WHAT A FIELD OF OPPORTUNITY—WHAT A PROFIT!

This is an opportunity you must seize quickly, for quick profits. At the almost unbelievably low cost to you of only \$1000, you can make a BIG, FAST, PROFIT on every Walk-In you buy. For only Frigid-Freeze with its wide experience and unmatched mass production methods makes possible this Walk-In offer that is without equal in the industry.

So don't hesitate one minute—get aboard the gravy train. You know a bargain when you see it—don't miss this one. The wires will start burning up with orders so be in there FIRST for FAST delivery—don't take any chances. Order one, or order 10—BUT DO IT NOW!

HERE ARE READY MADE MARKETS for Frigid-Freeze Walk-Ins

Butchers
Supermarkets
Ice Cream
Companies
Hotels
Hospitals
Grocers
Fish Wholesalers
Schools
Camps
Farms
Estates
Meat Wholesalers
Restaurants
Institutions
Clubs
Poultry Raisers
Airports
Steamships
Fur Storage

Pioneers IN LOW TEMPERATURE REFRIGERATION

REFRIGERATION CORPORATION
of AMERICA



Executive Sales Offices: Barber Sta., Perth Amboy, N. J.
Factories: Perth Amboy and Arlington, N. J.



WIRE US RIGHT NOW (OR USE THIS HANDY COUPON!)

Refrigeration Corporation of America
Barber Station, Perth Amboy, N. J.

- ☐ Enter my order for ☐ Model 160 Frigid-Freeze Walk-Ins.
☐ Rush additional information on Frigid-Freeze Walk-Ins.
☐ Have Frigid-Freeze representative call at once.

(Specify whether high or low temperature model.)

Your Name.....

Address.....

IMMEDIATE DELIVERY

ON ALL SIZES UP TO 730 CU. FT.



Filtrine
HIGH EFFICIENCY

WATER COOLERS

GALLON FOR GALLON...YOUR BEST BUY!
For Cafeteria use... stainless steel cabinet models in all sizes. For Industrial use... variety of models for temperatures down to 34°
Several choice areas available for manufacturers' representatives.

FILTRINE MANUFACTURING CO.
53 Lexington Ave. Brooklyn 5, N. Y.
Manufacturers of Coolers & Filters for over 40 Years

SERVICE REPRESENTATIVE

Air conditioning, refrigeration and heating service representative wanted by leading manufacturer. Must be of high standards and capable of contacting dealers. Salary, expenses. Must have a background in refrigeration, heating and air conditioning.

Reply Box 2518

Air Conditioning & Refrigeration News

ACRMA Issues Booklet On Application Standards

WASHINGTON, D. C.—Air conditioning contractors and sales engineers, as well as buyers and buyers' representatives, will find use for the Application Engineering Standards For Air Conditioning For Comfort just published by the Air Conditioning & Refrigerating Machinery Association, Inc., of Washington, D. C.

Prepared primarily as "recommended practice" for ACRMA members, comprising principal equipment manufacturers, this 16-page, 8½ x 11-in. booklet incorporates text and tables covering design load factors, design outside and inside conditions, sunlight radiation through glass, ventilation and infiltration, design occupancv, heat gain from occupants and appliances, transmission coefficients, air distribution, and capacity specifications.

In a foreword, the association states: "These recommended standards were designed not to supplant, but rather to supplement, individual company practice and data prepared and published by technical societies. In compiling these recommended standards, the members of ACRMA used as bases not only authoritative published material and generally-accepted industry practice, but also their own practical experience in the application of the industry's products."

This new publication is priced at \$1.00, with a schedule of discounts for quantity purchases. It is available from the association's headquarters, Southern building, Washington, D. C.

Houston Store Installs Big Air Conditioning System To Aid Shoppers

HOUSTON, Tex.—Foley's new and beautiful department store, scheduled to open Oct. 20, will offer Houston citizens the ultimate in air conditioning for shopping comfort.

Based on a dehumidifying process as well as lowered temperature, Foley's air conditioning can be easily regulated to give the most comfortable atmospheric condition. Not only will this system provide for maximum employee-shopper comfort, but it will also control the humidity at levels best suited to maintain the original quality of merchandise.

Another noteworthy feature is the use of electronic air filters, which electrically charge and eliminate dust particles, to supply cleaner-than-clean air throughout the store. There are 58 such units installed in the new store.

Thirty-two separate air conditioning cabinets will govern the flow of cold air throughout the building. These cabinets will be strategically placed so that extra output can be furnished a given section when necessary.

Prior to this time, the electronic industrial instruments employed in this system have been used almost exclusively for behind-the-scenes processing, manufacturing, research, and testing.

The instruments for the entire store system in the new Foley's are located in one control room from which the temperature and humidity of the refrigerator plant, boiler room, and all selling areas will be controlled and recorded.

The engineer in charge of the system will be able to sit at his desk in this central control room and, from that position, check atmospheric conditions in any part of the store.

Three miles of chilled water piping, through which 3,600 gallons are circulated each minute, will wind through the new Foley's store. In addition to the large amount of pipe to be used, the system will utilize four 50-hp. chilled water pumps, 16 miles of duct work providing 600,000 cu. ft. of air per minute and a complete change of air every five minutes. A total of 28 exhaust fans and 69 motors will push the air through 1,200 grill outlets in the store.

Foley's is the latest addition to the Federated Department Stores group, which includes Filene's of Boston, Brooklyn's Abraham & Straus, Bloomingdale's in New York, F & R Lazarus in Columbus, and Shillito's in Cincinnati; and its new home is designed to illustrate the Federated concept of modern merchandising.

At the instigation of Fred Lazarus, Jr., Federated's president, exhaustive surveys have been conducted throughout this group of department stores, and affiliated A.M.C. stores, for the purpose of discovering how the retailer can make it easier for the customer to buy, and easier for the salesclerk to sell.

The results of this study have formed the background of planning for the new Foley's store, producing an efficient, streamlined operation hitherto uncommon in the retail field.

Dept. Stores Continue Low Volume: Sales Down 1%

WASHINGTON, D. C.—The nation's department stores reported a 1% drop in sales volume for the week ending Sept. 13 over the same week a year ago, according to the Federal Reserve Board.

During this same week sales of the New York City department stores dropped 2%; Boston department stores showed a drop of 8%.

Philadelphia, St. Louis, Kansas City, and San Francisco were among the only major cities in the survey to show increases in sales for the second week in September over last year. These increases ranged from 1% to 7%.

Drops in sales for the four-week period ending Sept. 13 were recorded in all of the major cities except San Francisco, which had a rise of 6% over the same period last year. The average drop in department store sales for the nation during this period was 2%, according to the board's figures.

Air-Cooling Bill--

(Concluded from Page 1, Column 2)
temperatures shall be at least 10° lower than the outside temperature when the latter is above 95°.

The bill also contains provisions regarding air changes, the amount of outside air required, and air filtration. Text of the bill follows:

A BILL

TO REGULATE AND CONTROL THE WORKING CONDITIONS OF EMPLOYEES IN CERTAIN INDUSTRIES IN THIS STATE AND PROVIDE PENALTIES FOR VIOLATING THE PROVISIONS THEREOF.

BE IT ENACTED by the General Assembly of the State of South Carolina:

SECTION 1: All textile manufacturing plants and all industries wherein wearing apparel is made from cloth or yarn in this State, shall provide working conditions for its employees in accordance with the provisions of this Act.

SECTION 2: No such employee shall be required or permitted to work in any room where the relative humidity is higher than eighty (80) per cent, nor where the temperature of such room is raised by heating devices higher than eighty-five (85) degrees Fahrenheit; **PROVIDED, HOWEVER,** that when the outside temperature is above ninety-five (95) degrees Fahrenheit, the work room temperature shall be at least ten degrees lower than such outside temperature. Each work room of such employee which has less than eight per cent of the floor space thereof served by open windows or doors, shall receive at least four changes of air per hour. Where mechanical means are used to ventilate such work room, a minimum rate of twenty-five cubic feet of air per person working in such room per minute shall be supplied from the outside of such room and not more than 200 cubic feet per person shall be allowed for work space. All air blown into a work room shall be free of unusual amounts of dust, smoke or other contaminants.

SECTION 3: The Commissioner of Labor of this State shall have the authority to issue permits for exemptions to employers coming under the provisions of this Act where in his opinion such exemption is justified by reason of the fact that to comply with such conditions will work an undue hardship to such employer. Such exemption shall clearly state the provisions of this Act which the employer is exempted together with the duration and length of time of such exemption. Said Commissioner of Labor shall enforce the provisions of this Act and he is given authority to make necessary rules and regulations for the proper administration of this Act.

SECTION 4: The provisions of this Act shall not apply to employees engaged in the operation of the heating unit of such plants or industries.

SECTION 5: Any person, firm or corporation who violates any of the provisions of this Act or any of the rules and regulations promulgated for the enforcement of this Act, shall be guilty of a misdemeanor and, upon conviction thereof, shall be fined not less than \$25.00 nor more than \$100.00, or imprisoned for not less than ten (10) days nor more than thirty (30) days, each day of such violation shall constitute a separate and distinct offense.

SECTION 6: All Acts or parts of Acts inconsistent with the provisions of this Act are hereby repealed and if any Section or Provision of this Act be held unconstitutional, such shall not affect the remaining sections or provisions.

SECTION 7: This Act shall take effect one year from the date of the approval of same by the Governor.

Before Buying ANY Beverage Cooler

Compare GENERAL'S Perfected Dry Beverage Cooler With ANY Wet Cooler

General Refrigerators Corp.

Manufacturers Since 1928

678 Broadway New York 12, N. Y.

HEAT TRANSFER EQUIPMENT

MARLO
COIL COMPANY
SAINT LOUIS, MISSOURI

CURTIS
REFRIGERATION
AIR CONDITIONING
COMMERCIAL

For All Your Refrigeration and Air Conditioning Requirements

Curtis Refrigerating Machine Division

of Curtis Manufacturing Company R-528

1912 Kienlen Ave. St. Louis 20, Mo.

Established 1854

PIONEERS IN THE MANUFACTURE OF COMPLETELY PACKAGED AIR-CONDITIONERS*

Manufacturers of:

- Evaporative Condensers
- Air Handling Units for Heating and Cooling
- Unit Coolers for Refrigeration
- Blast Coils for Heating and Cooling

EXCELLENT DELIVERY

Recent increases in our production facilities enable us to make rapid delivery on most of our products.

FOR FURTHER INFORMATION CONTACT YOUR GOVERNNAIR DISTRIBUTOR OR WHOLESALER, OR WRITE DIRECT.

GOVERNNAIR CORPORATION

513 N. BLACKWELDER OKLAHOMA CITY, OKLA.

P. O. BOX 1654

* with evaporative condensers, U. S. Patent No. 2,297,928.

Philadelphia ASRE To Present Symposium on Display Case Arranging

PHILADELPHIA—An attempt to supply answers concerning the proper types and arrangements of refrigerated display cases for various applications will be made in a "Refrigerated Display Case Symposium" to be sponsored the night of Oct. 3 by the Philadelphia section of the American Society of Refrigerating Engineers.

The meeting will open at 8 p.m. at the Engineers Club.

Wroe Alderson, consultant with Alderson & Sessions, Inc. of Philadelphia, will present the consumer's and retailer's viewpoint. The display case manufacturer's side of the story will be given by John F. Staples, sales manager, C. V. Hill & Co., Inc., Trenton, N. J., manufacturer of commercial refrigerator equipment. A floor discussion from both users and sellers of such equipment is expected to add much information to that supplied by the principal speakers.

A graduate of George Washington university and formerly connected with the U. S. Department of Commerce as well as the F.E.A., Mr. Alderson is the author of the marketing study "Retail Operation in the Grocery Field," which work resulted in his receiving the 1947 "National Marketing Award" presented by the American Marketing Association.

Mr. Staples, except for a period of service in the Ordnance Department during World War II, has been associated with the commercial refrigerator field since 1926. He has been commercial manager of the Kelvinator Detroit branch; a distributor for C. V. Hill & Co., western manager for Hill, and now sales manager for the company.

V. J. McIntyre Will Devote Main Effort to New Firm

LOS ANGELES—Vincent J. McIntyre has withdrawn from active management of the Bandoli-McIntyre Co. here for the purpose of devoting his time to the presidency of the Utilities Sales Co., which he has recently formed.

Bandoli-McIntyre is a distributor of appliances and radios, while it is said the new Utilities Sales Co. will function as manufacturers' representative, supplying the West Coast with commercial and household electric refrigeration parts and accessories.

Mr. McIntyre, who aided in the formation of the distributorship two years ago, announced that he will continue as a director and retain his financial interests in the Bandoli-McIntyre firm. Formerly he was sales manager for Nash-Kelvinator Corp.

Pair Sets Up as Florida Equipment Distributor

CRESTVIEW, Fla. — Okaloosa County's first distributing agency for refrigeration equipment was opened here recently by two local men, L. A. Hilton and H. H. Holmes. The firm will do business under the name of West Florida Refrigeration Equipment Co. and is located in the building formerly occupied by J. M. Lee & Son.

Holding franchises on a number of lines of refrigeration equipment, the new firm will feature air conditioning units, cooling systems, domestic and commercial refrigeration, and freezing equipment.

Both men are well known here. Mr. Hilton formerly operated the Greyhound Bus Station while Mr. Holmes served four years in the Air Forces at Eglin Field. Mr. Holmes served as instructor in a Tennessee refrigeration school prior to returning to this section.

New California Firm To Handle Airtemp Line In 3 Fields

BAKERSFIELD, Calif. — Norman Harris and A. H. Folk have formed the Refrigeration Construction Co. here and have been named dealers for Chrysler-Airtemp refrigeration, air conditioning, and heating equipment, according to an announcement by the company.

'Mfrs. Must Safeguard Users'

Higher Voltage Domestic Current Urged To Reduce Hazard In Using Appliances

NEW YORK CITY—Urging safety engineers to bring pressure to impose regulations on manufacturers of appliances to safeguard their users, George Thompson, chief engineer of Electrical Testing Laboratories, Inc. warned in an address here that the low voltage current used in home electrical appliances causes a higher percentage of deaths in cases of shock than does a current of higher voltage.

Speaking at a meeting of the American Society of Safety Engineers, Thompson said that shock from current of high voltage usually causes such severe muscular contractions that the victim is thrown clear of the source of current. The muscular contractions, he explained, are the result of artificial stimulation of the whole nervous system caused

by passage of electric current through the body.

Thompson said that in shock from low-voltage currents muscle contractions are less violent and the victim may be forced to tighten his grasp on the source and be unable to let go. He further declared that currents of low voltage can cause severe damage to the nerves, the brain cells, the blood and the heart if they pass through the body for a short time. A current of 11 volts was considered hazardous for this reason, he said.

Many of the home accidents involving electrical shock occur in the bathroom, he said, because moisture on the skin surface reduces the resistance of the body to an electric current. And, he added, there are a number of sources of the ground needed to complete passage of the

current through the body in the bathroom. He said that in his own house the switch for the bathroom lights was located in the hall outside the room.

Asserting that electric immersion heaters, sometimes used to heat small quantities of water in the wash basin, are especially dangerous, Thompson urged the safety engineers to "show no mercy" in discouraging their use.

Power-driven electrical appliances with motors of the type using commutators, designed to operate on either alternating or direct current, create interference in electronic devices, Thompson said, and are usually equipped with a suppressor to reduce the amount of interference. Because the suppressor is frequently in contact with the line voltage, he warned, touching it may result in a dangerous shock.

Thompson further declared that extension cords with worn or frayed insulation are responsible for 23% of home electrical accidents. They are particularly dangerous, he pointed out, when plugged into a socket before the appliance they are to operate is attached to absorb the electric current.

Frigidaire Earmarks 1,000 Milk Coolers for Sweden

DAYTON—An allocation of 1,000 automatic electric milk coolers of the latest design, earmarked for shipment to Stockholm for distribution among farm milk producers in central Sweden, may help bolster famished Europe's currently inadequate dairy product supply, an export department spokesman for Frigidaire Division of General Motors disclosed.

L. C. Shannon, the company's Canadian and export department manager, pointed out that the new coolers are equipped with the latest type "drop-in" refrigerating units.

"It is apparent that Swedish dairy farmers are adopting the most modern methods and equipment to augment their milk production," declared Mr. Shannon. "These up-to-the-minute units will afford initial milk cooling at proper temperatures, lowering the bacteria count, and reducing spoilage."

The equipment is being installed by A. B. Frigor Industri, of Stockholm.

It's Doubly ~~THRIFTY~~ to Own the New KOCH 25 Cu.ft. ➔



THIS KOCH REACH-IN HAS EVERYTHING YOU WANT

No Wood Used to Interrupt Insulation
216 cube ice maker

With the new KOCH all stainless steel reach-in refrigerator you eliminate food spoilage through better food maintenance... it provides a surprising economy of operation with a lifetime of service. In this versatile commercial refrigerator you now have a 21 pound ice maker. You can freeze 216 cubes at a time or remove 4 trays and a shelf leaving 108 cubes and gain a space 5½ inches high, 13 inches deep and 12 inches wide for storage of frozen foods. Sixty-four years of refrigerator manufacture, plus the rich experience accumulated in making thousands of Stainless Steel Refrigerators for the U.S. Navy, assure you of America's finest refrigerator... all stainless steel, fully welded into one unit! For a lifetime of thrift, insist on KOCH. It's a beauty and has no equal!



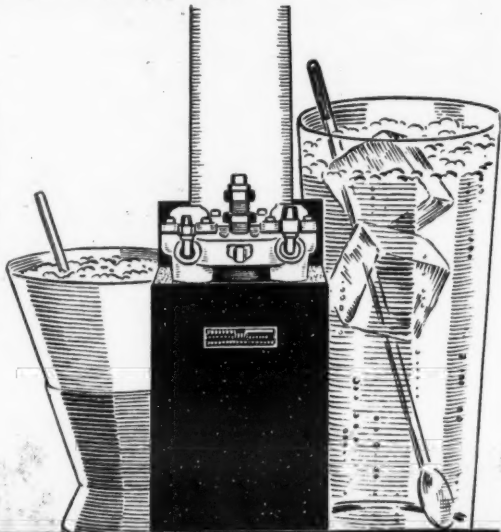
bubbles without troubles

With a Lifetime Service Agreement

The fine service reputation of PREST-O-MATIC Carbonators makes the new Model C a must in your equipment line. The trade now recognizes the name PREST-O-MATIC as synonymous with trouble-free carbonation. Dispensers like the small investment, thrifty operation, lack of service, assurance of instantaneous constant quality, constant pressure PREST-O-MATIC soda water that makes every drink sparkle!

The response from distributors has been enthusiastic. They tell us the New Model C is not only a sure-sale specialty. It is a door-opener on every cill. It helps sell other equipment lines bought by bars and fountains dispensing mixed drinks and soda water. The franchise is valuable. Important territories are open. Write, wire or phone for proposition . . . RAndolph 0417.

Model C PREST-O-MATIC is the only motorless carbonator you do not have to install in a refrigerated area. 26" x 6" x 6 1/2" . . . shipping weight 26 pounds . . . 20 gallons of carbonated water an hour . . . operates on water pressures from 15 pounds up. Precision-engineered against trouble . . . no springs to adjust . . . simple to install . . . easy on the pocketbook.



YOU'VE TRIED THE REST
... NOW TRY THE BEST

The New Model C PREST-O-MATIC

Prest-O-Matic Products Co., Inc.

315 Beaubien St., Dept. A, Detroit 26

Branch: 3900 E. Cooper, Tucson, Arizona

Market Sells 20 Times As Many Chickens After Converting Display Case

DENVER—Twenty times as many chickens for frying, stewing, and baking are sold by the Boy's Supermarket at First and Broadway here, since Owner Fred Goldhammer converted a display case into a "poultry freezer case" and installed two low temperature refrigerators in the rear of the store.

"We could never keep enough poultry on hand to satisfy the demand where the quick-frozen variety was concerned," Mr. Goldhammer said, "because of limited sub-zero storage and display facilities. The same was true with frozen fish fillets, oysters, shrimp, scallops, and other items for which we have calls."

The two low-temperature boxes are set up behind a partition in the rear of the store, and are used to supply the "converted meat case" in the meat department. As many as 12 dozen sharp frozen chickens are kept there at all times, and sales of frozen chickens have grown to the point that the Boy's Supermarket is now selling 20 times as much as was possible before the refrigerator conversion was made last May.

The low-temperature equipment is also used to supply frozen seafoods the year-round—something which the store has always needed, and to do away with spoilage and loss on such perishable fish as halibut. Fillets for the day's selling are cut from the whole frozen fish, which is kept always in a frozen state.

Conditionaire Promotes Commercial Equipment With 'Spot' Advertisements Accenting Seasonal Appeal

ST. LOUIS—Conditionaire Co. here has obtained maximum efficiency from small spot advertisements by promoting seasonal equipment as monthly specials. The small spots which are run in the daily St. Louis newspapers are given added impact with these specials which are picked to correspond with the season.

For instance during June, when hot weather was increasing the demand for beer, the company advertisements featured Penflo Beer Coolers. Under the heading of June Special, copy in the white on black advertisement was as follows: "Penflo Beer Dispensers. For good beer at its best flavor and temperature, use Penflo patented dispensers. Keeps beer the exact same temperature from barrel to tap. Much shorter coils—more glasses per barrel—no wild or morning beer. Thousands already in use. On display at—Conditionaire Company."

Then during July when high temperatures were accounting for a higher ratio of food spoilage, the



July special was a reach-in refrigerator. Copy read:

"Carrier Reach-in Refrigerators. Commercial sizes, 17 cu. feet. and up, of Carrier's outstanding reach-in refrigerators. Dulux or enamel. Blowers or ice makers. We'll be delighted to help you determine the kind you need."

100 ft. of Open Cases Attract Dairy Item Sales

DENVER—More than 100 ft. of self-service, open refrigerated cases are utilized to sell all dairy products in the new Miller Supermarket on East Colfax and Hudson here.

Representing the largest layout of self-service refrigeration in any of the Miller markets, the setup includes two new Weber stainless steel fixtures for cheese, eggs, poultry, oleomargarine, and fish, three Hussmann self-serve boxes for milk, cheese, and delicatessen delicacies, and four more Hussmann frozen food display cases near the checkstand.

There is absolutely no "reach-in" refrigeration in the store, which is the largest of the Miller chain.

Sampson Electric Sales Co. Will Distribute 'Blue Flash' Line

LOS ANGELES—The Sampson Electric Sales Co. has been appointed distributor in southern California for the Brunswick-Balke-Collender Co.'s "Blue Flash" line of commercial beverage and food refrigerators, according to A. G. Rea, who has been appointed general sales manager of Sampson's "Blue Flash" division.

The sales firm is a subsidiary of the Sampson Electric Co. which has been in the wiring, contracting, and appliance business for 15 years, Mr. Rea said.

G-E Distributor Opens Branch In Greensboro

RALEIGH, N. C.—R. Walker Martin, president of Nash-Steele-Martin, Inc. here, distributor of General Electric products in North Carolina, has announced the opening of a sales office and warehouse at 321 South Davie St., Greensboro, which will handle distribution of General Electric products in 21 counties of the state.

Mr. Martin said the establishment of the Greensboro branch is the third in the brief history of his firm which was organized here in 1944. A Charlotte agency was opened in 1945.

E. Bruce Peabody, formerly associated with General Electric Credit Corp. has been named operations manager of the Greensboro branch, which will serve the following counties: Ashe, Alleghany, Watauga, Wilkes, Surry, Yadkin, Davie, Forsyth, Davidson, Stokes, Rockingham, Guilford, Randolph, Montgomery, Richmond, Moore, Alamance, Chatham, Lee, Hoke, and Scotland.

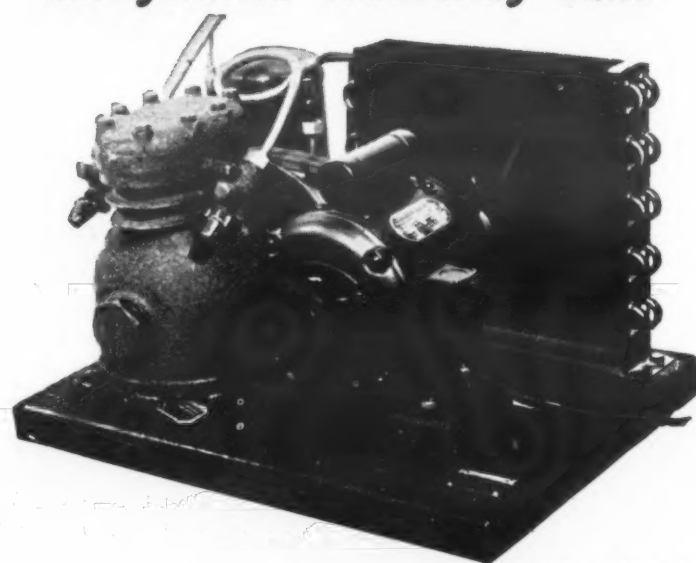
Shrimp Trawler Freezes Catch While on Grounds

SYRACUSE, N. Y.—A new 108-ft. shrimp trawler, *Arcturus*, designed to freeze shrimp while on the fishing grounds, has been built by Higgins Co. of New Orleans for the Gulf Frozen Shrimp Co., Inc. The freezing equipment was made by Carrier Corp.

The *Arcturus* is equipped to catch, clean, pack, and freeze shrimp, discharging neat frozen cartons all ready for the consumer. This development has several advantages: the catch is fresher; spoilage is reduced; the fishing vessel's payload is increased; and objectionable odors, caused by a juice which shrimp exude when packed in a hold, are eliminated.

The Carrier freezing equipment on the *Arcturus* includes one 7G8 compressor, one 7H5 compressor, one 15Q6 and one 15Q2 cold diffuser.

MULTIPLEX Refrigeration Condensing Units

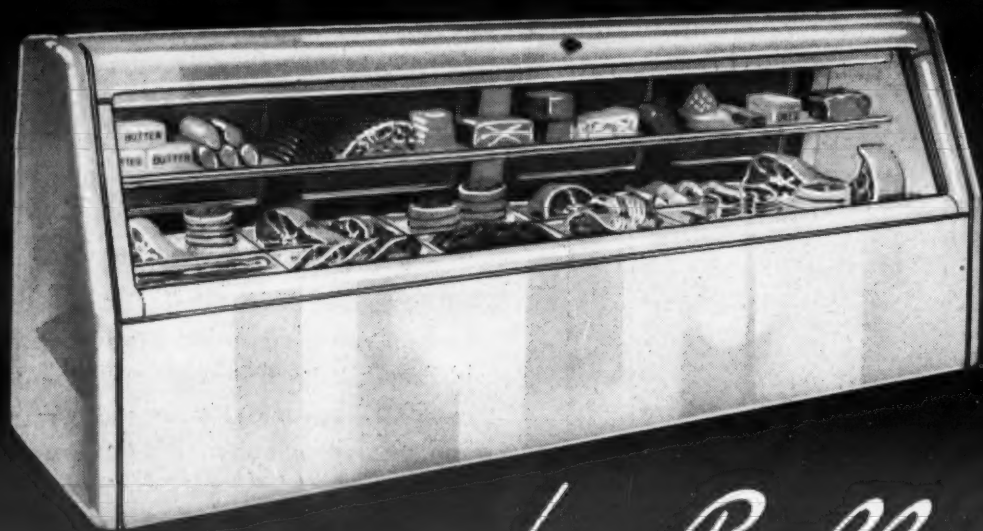


Complete with motors in
1/4, 1/3, 1/2, and 3/4 HP sizes
Inquiries From Jobbers Invited

Multiplex Manufacturing Co., Berwick, Penna.

NOW AVAILABLE

Refrigerated Display Cases of Distinction



by Bally

By Oct. 15th we will be using our new PORCELAIN ENAMELING PLANT. . . . The designers of this mill tell us that it will be the Finest Box-Furnace Type Mill in the East. . . . To us it will mean BETTER PORCELAIN—and INCREASED PRODUCTION.

In anticipation of this increased production we invite inquiries from distributors in those areas where our cases are not now sold . . .

our Product and our Sales Policy are geared to fit the needs of those Discriminating and Far-sighted Distributors who insist on "QUALITY."

"You Can Depend on a Bally"



Bally Case & Cooler Co.

MAIN OFFICE & FACTORY

Bally, Pennsylvania.

EFFECTIVE FINANCING WILL PROMOTE BETTER RELATIONS

WITH THAT SEGMENT OF THE PUBLIC TO WHOM YOU

LOOK FOR PROFITABLE SALES. TO BE EFFECTIVE IT

CAN'T BE STATIC. CONDITIONS CHANGE. COMPETITION

CHANGES. COMMERCIAL CREDIT PLANS FOR THE

COMMERCIAL REFRIGERATION INDUSTRY KEEP PACE FLEXIBLY

WITH THE REQUIREMENTS OF CHANGING MARKETS. YOUR

COMMERCIAL CREDIT REPRESENTATIVE CAN GIVE YOU

PRACTICAL HELP IN SETTING UP A FINANCING OPERATION

TO FIT YOUR PARTICULAR NEEDS. CALL HIM IN.

COMMERCIAL CREDIT CORPORATION

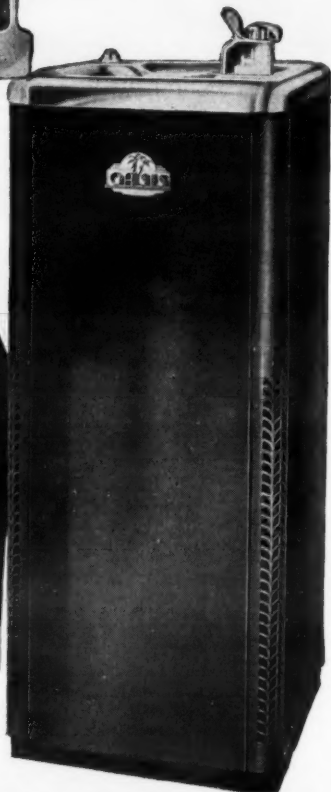
A Subsidiary of Commercial Credit Company, Baltimore

MORE THAN 300 OFFICES IN PRINCIPAL CITIES OF THE UNITED STATES AND CANADA



Warranted
for
5 Years

Peak efficiency plus eye-catching style are engineered into OASIS Electric Water Coolers. . . Dual-purpose corner grilles cross-ventilate the condensing unit and accent the trim new beauty of the bronze-walnut cabinet. Its stainless steel top adds stay-clean brightness; the Ebco 12000 bubbler features a rotary handle for smooth, splash-free water-flow; a rugged cooling mechanism assures steady service; inset base provides more toe room. Ebco-made OASIS is finest in quality . . . a leading tradition for 20 years in the water cooler field.



The **EBCO** MANUFACTURING COMPANY
401 WEST TOWN ST., COLUMBUS 8, OHIO

Early '47 Cost Ratios Shift from '46 Levels, New Inland Empire Dealers' Study Shows

SPOKANE, Wash.—Though electrical appliance dealers in this area paid proportionately less for their merchandise during the first quarter of 1947 than they did during 1946, their total operating costs increased, leaving their net profits about the same.

Those were the findings of a second cost ratio survey conducted among its members recently by the Inland Empire Electrical Dealers Association.

In its first survey covering 1946, the association found that cost of goods sold averaged 72.9% of net sales. In the second survey, covering the first quarter of 1947, this cost averaged 70.5% of net sales, or a decline of 2.4%.

At the same time, the 1947 survey showed, total operating expenses advanced 2.1%, thus leaving a .3% increase in net profits.

"The 2.4% difference between 1946 and 1947 cost of goods averages is important," the association declared in its summary of the statistics.

"Part of this change can be credited to the abandonment by many dealers of low discount lines," it declared. "Furthermore, some manufacturers have increased dealers' discounts since 1946."

"With administrative costs and miscellaneous expenses substantially lower than prewar averages, the average Inland Empire dealer is still able to overcome the disadvantages of lowered gross profits."

Inland Empire Cost Ratio Study No. 2 First Quarter 1947

Item	Net Profit 10% and Over	Net Profit Under 10%	Average of All Reports	1946 Average of All Reports	Change 1946 to 1947
Net Sales	100.0%	100.0%	100.0%	100.0%	
Cost of Goods Sold	71.0	69.8	70.5	72.9	-2.4
(Gross Profit)	(29.0)	(30.2)	(29.5)	(27.1)	(+2.4)
Operating Expenses:					
A. Occupancy	2.1	5.7	3.4	3.4	
B. Proprietors' salaries					
Average of all reports	1.6	2.8	2.0		
(Average of reports which listed proprietors' salaries)	(8.9)	(4.0)	(5.7)		
(Average monthly salary of those reporting salaries)	(\$276)	(\$250)	(\$267)		
C. Administrative and General	5.9	8.2	6.7	8.8	*-0.1
	*(7.5)	*(11.0)	*(8.7)		
D. Selling:					
1. Compensation of salesmen, average of all reports	4.1	3.6	3.9	3.1	+0.8
(Average of reports listing compensation)	(6.9)	5.2	(6.2)		
2. Advertising and promotion	0.9	3.2	1.8	0.8	+1.0
3. Other selling costs	0.4	0.5	0.4	0.9	-0.5
Total Selling Expense	5.4	7.3	6.1	4.8	+1.3
E. Other Operating Expense	0.5	2.1	1.0	0.1	+0.9
Total Operating Expense	15.5	26.1	19.2	17.1	+2.1
Net Profit	13.6	4.1	10.3	10.0	+0.3

*Since proprietors' salaries were included in administrative expense in the 1946 study, a comparison of 1947 and 1946 figures on administrative expense requires that proprietors' salaries be added into the 1947 administrative expense ratio. Figures in parentheses are these totals.

"Although cost ratio survey No. 2 suggests that rising selling costs may bankrupt marginal operators if present discounts remain, it also suggests that those dealers whose expenses are under control can continue to enjoy satisfactory profits."

In making its second cost ratio survey, the association deviated from its original method in two respects.

First, reports were divided into "high" and "low" profit categories at the 10% net profit level instead of at the 3% level previously used. This separated the reports into two approximately equal groups.

Second, proprietors' salaries were listed separately. In the 1946 report they were included in the administrative expense category. So that comparisons could be made, additional figures were inserted into the second report putting proprietors' salaries under administrative expenses.

"Proprietors' salaries were reported by 75% of the dealers whose net profits placed them in the 'low' profit category but by only 43% of those in the 'high' profit group," the association commented.

"It is significant that the average salary ratio of the 'high' profit deal-

ers who reported salaries was more than double the average salary ratio of the 'low' profit dealers who took proprietors' salaries."

"The 'high' profit dealers who took salaries took larger salaries than their 'low' profit competitors and still made more profit."

In discussing the selling expenses reported in the survey, the association declared, "Total selling expense was slightly higher in the first quarter of 1947 chiefly because of expected increases in costs of advertising and salesmen."

"The 'high' profit group averaged slightly more for salesmen but materially less for advertising than did the 'low' profit group. Advertising expense of 'low' profit dealers was unusually high, even exceeding the 1939 cost of 2.6% reported with the 1946 survey."

"High' profit dealers who reported salesmen's compensation paid salesmen 1.7% more of net sales than did 'low' profit dealers who had salesmen. Unlike 'low' profit dealers, they kept advertising expenses down to a level comparable to 1946 expenditures."

Detailed results of the study are presented in the above table.



Helps you sell her now —
and next time —

BONDERIZING



Assurance of lasting fine appearance is a big factor in a customer's choice of a refrigerator or home freezer. Women know from experience that Bonderizing preserves and protects fine finishes on metal. The Bonderized appliance she buys today will still look well when she's ready to replace it.

Bonderizing anchors paint to metal, prevents chipping, peeling, and flaking. It guards against rust and corrosion.

Stress the added values of Bonderizing on the appliances you sell. It'll help you sell them this time—and it will help you bring them back for the next sale!

PARKER RUST PROOF COMPANY, 2170 East Milwaukee Ave., Detroit 11, Michigan

BONDERIZING

Holds Paint to Metal

PARKER PROCESSES

PARKERIZING

Inhibits Rust

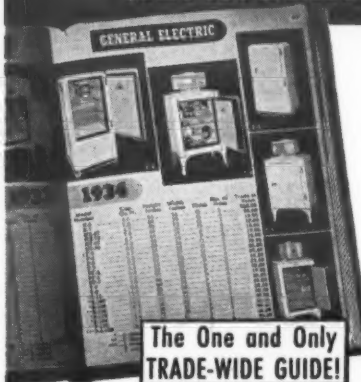
PARKER PROCESSES

PARCO LUBRIZING

Retards Wear on Friction Surfaces

Bonderite, Parco, Parco Lubrite—Reg. U. S. Pat. Off.

The STANDARD Reference Manual on REFRIGERATORS and FREEZERS



**NEW 1947-1948
EDITION
NOW IN PRESS!**

- More than 1150 photographs
- More than 3300 model specifications
- Authentic trade-in valuations for all household refrigerators marketed since 1921
- Operating data on Merchandising, Promotion, Reconditioning

The One and Only
TRADE-WIDE GUIDE!
• Arranged and indexed for quick reference.
• All appraisals have been revised to reflect current market factors.
Use the Standard Manual to identify and evaluate every refrigerator and freezer accurately.

Bound in washable green cloth—320 pages. Pocket Size—4 3/4" x 6 1/4". Price—\$4.95
NOTE—A limited quantity of current (1946) edition still available for immediate delivery.

STANDARD REFRIGERATOR TRADE-IN MANUAL CO. 503 W. 43rd St., N. Y. 18, N. Y.

Please enter my order for _____ copies of 1947-1948 Manual @ \$6.00 each.
Please send me at once _____ copies of 1946 Manual @ \$5.00 each.

NAME _____
STREET ADDRESS _____
CITY _____ ZONE _____ STATE _____

Check or Money Order enclosed ☐ Bill us per enclosed purchase order ☐
(We pay postage on prepaid orders.)

Meat Consumption May Be Boosted 13% During Next 8 Years by Prepackaging

CHICAGO—Packaged meats, which offer the consumer a chance to serve herself at the meat counter, were hailed by F. M. Specht, president of Armour & Co., as a potent means of increasing per capita meat consumption in this country 20 lbs. in the next eight years.

Speaking before the American Meat Institute's 42nd annual meeting, Mr. Specht declared that stores with self-service meat counters will be able to sell meat put up this way and will save their customers about 20 minutes of shopping time.

He noted, however, that less than 5% of meat sales today are from self-service counters.

He saw in packaged meats an opportunity for meat packers to make their identity known all the way to the kitchen. Packers can help the trend to packaged meats along by indicating on each package just how much it contains and how the contents are to be used, he said.

Mr. Specht estimated that meat consumption this year will average about 155 lbs. per person as compared to 138 lbs. between 1939 and 1941. He would like to see this reach 175 lbs. by 1955.

"There has been a record number of births in this country the past few years," he declared. "There will

be more buyers in our stores, more families to feed, more opportunity for increasing our volume."

To get that volume, he also suggested that merchants offer a wider variety of meats and that the industry educate customers on how to use less popular cuts.

"Women go to the market and bid up the higher grades of beef while lower grades go begging, just because the consumer does not know the proper kitchen processes for this type of meat," he stated.

"From that standpoint, I think we can truthfully say that low prices cause high prices, and, of course, low prices discourage livestock production."

"Shoulder cuts of the hog, for example, constitute about 25% of the meat yield of the hog. It has usually been far more difficult to get a fair price for these shoulder cuts than for the hams, the loins, and the bacon."

Commenting on the present "fortunate position" of the meat packing industry, Mr. Specht noted that a continued high rate of livestock production is anticipated and that retailers "are enlarging and remodeling their stores, installing new fixtures, better lighting, and better arrangements."

REMA Lists Addition Of 5 Member Firms

PITTSBURGH—Addition of five new member companies to the Refrigeration Equipment Manufacturers Association has been announced here.

New members are the Brew-Titchener Corp. of Binghamton, N. Y., Rigidbilt, Inc. of Chicago, The Texas Co. of New York City, Typhoon Air Conditioning Co., Inc. of Brooklyn, and Victory Metal Mfg. Corp. of Philadelphia.

Lumber Company Opens First Appliance Store

CHICAGO—A full page advertisement featuring General Electric appliances and radios announced the opening of the first of three appliance stores by a local lumber company here.

George S. Smith, formerly a major appliance buyer for Montgomery, Ward & Co., is in charge of the operation for the Czerwies Lumber Co. He explained that the Czerwies brothers, Joseph R. and John A., plan to open two more similar retail stores adjacent to their other lumber company branches. A total expenditure of approximately \$200,000 will be made by the spring of 1948, when the three store chain is expected to be completed, he said.

The present location is in a new building, occupying approximately 20,000 sq. ft. of space. Mr. Smith asserted that his policy will be to offer a "rounded selection of name brand appliances and radios."

U.S. Vending Corp. Names Schrock, Haring, Miles Downing Engineering Head Get Posts at Erie Works

CHICAGO—United States Vending Corp. here announces the appointment of William J. Downing as director of engineering.

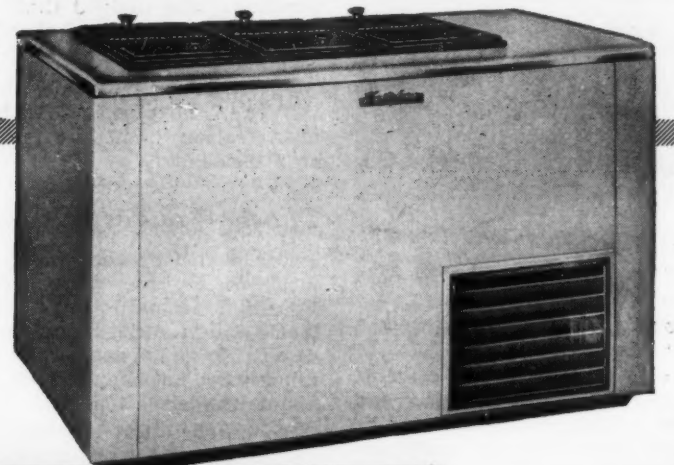
Mr. Downing has 34 years experience in mechanical and design engineering. For the past 11 years, he supervised design and production for one of the leading manufacturers of coin-controlled equipment, whose products included bottle vendors, phonographs, cup drink dispensers, and candy vendors. During that same period, he also supervised the manufacture of war contract equipment ranging from commercial refrigerating units to tail assemblies for AAF cargo planes.

ERIE, Pa.—Appointment of an assistant to a division engineer and the naming of two section engineers were announced at Erie Works, General Electric Co.

E. M. Schrock is appointed assistant to the division engineer of the quality control division, refrigerator cabinet engineering division.

C. L. Haring is named section engineer in the quality control division, refrigerator cabinet engineering division. He is responsible for quality control activities on domestic cabinets and home freezer cabinets.

R. C. Miles is section engineer in the quality control division, refrigerator engineering division.



ICE CREAM CABINETS

IMMEDIATE DELIVERY!

2-4-6-8-12 hole

Complete with or without units

- ALL STEEL CONSTRUCTION
- STAINLESS STEEL TOP with ROUNDED EDGES
- HARD RUBBER FLIP-FLOP COVERS
- WHITE ENAMEL FINISH

DISTRIBUTORSHIPS AVAILABLE • EXPORT INQUIRIES INVITED

ICE CREAM MANUFACTURERS SUPPLIED

Manufactured by

Frostedaire
CORP.

Division of WEST SIDE IRON WORKS
801 GREENWICH ST., NEW YORK 14, N. Y. • CHelsea 3-4900

Great New "Gold Seal" DOUBLE DUTY

DISPLAY CASES

DELUXE



STANDARD



Vitreous porcelain enamel exterior
Streamlined throughout
Four inch fibreglass insulation
Full length heavy duty capacity coils
Hard rubber sliding glass doors
Three-glass full vision front
Baffled refrigeration for controlled air circulation
Non-glare fluorescent lighting
Adjustable shelves
Removable rust-proof floor slats

"GOLD SEAL"

is the mark of quality in display cases. The name is your assurance of precision engineering, modern design... and exceptional value.

Immediate Delivery!

Available in 6 foot, 8 foot, 10 foot, and 12 foot lengths
Shipped Crated Complete, F.O.B. New York City.

Manufactured by

GOLD SEAL
REFRIGERATION
INC.

GOLD SEAL REFRIGERATION INC.

4412 Park Ave.

New York 58, N. Y.

Your
NEW
Filterpure
CATALOG
IS
READY



Get Your Copy from Your Wholesaler—or Write Us

BETZ CORPORATION
HAMMOND • INDIANA

INSIDE DOPE

by GEORGE F. TAUBENECK

(Concluded from Page 1, Column 1)

while away the time. Evers was agreeable.

But nobody in the crowd had a deck of cards.

Evers was equal to the occasion. (His previous hospital sojourns had taught him that it's easy to be ingenious). Strolling out into the hallway, he purloined a box of the hospital's "case-history" filing cards, and the game was on.

As "Hoot" tells it, the game was most exciting. Climax came when everybody dropped out of the pot but Evers and Trout, with at least \$40 at stake.

"I call," yelled Trout, exhibiting a full house consisting of three appendectomies and a pair of tonsillectomies.

Evers raked in the money. He had five-of-a-kind (a quintet of baby deliveries).

They Don't Pay Off on Batting Practice

Jimmy Dykes, one of the most colorful players and managers ever to grace the game of baseball, invited his wife and nine-year-old son out to see a game during his playing days with Philadelphia.

To his wife's delight, Dykes belted one over the fence during batting

practice. She nudged their son. "See what daddy just did?" she cooed.

The son was unimpressed.

"Yeah," he piped. "He hit one—at 2 o'clock. But the game starts at 3 o'clock."

Those Wonderful Dodgers

For some reason which escapes most of us, the mere mention of Brooklyn seems to evoke an automatic laugh out of audiences these days. No radio gag-writer seems to know why, but they're mighty happy about the situation.

To be sure, the Brooklyn Dodgers baseball team for more than a decade was the cause of many a bitter laugh and many a derisive catcall. But the Dodgers' fumbling antics surely can't account for the world-wide guffaw-appeal of the name, Brooklyn.

But just in case, we'd like to relate what we consider to be the best of all the gags about the hapless Dodgers of former years.

Two Brooklyn fans had made a date to meet at the ball game. One was a bit late. As he made his way to the appointed box, his friend shushed:

"Take it easy, Joe. Cross your fingers. The Dodgers have three men on base."

"Which base?" asked the late-comer, stifling a yawn.

Comedy of Errors

Ol' Doc Cramer, who is well into his forties, is still a great ball player. Not even the incomparable Ty Cobb looked better after he had reached "the dangerous age" than Cramer.

Phenomenal for his age though he is, however, Cramer has always been more engrossed in his family than in baseball.

He loves to tell about the time that his wife decided they should live on a farm for a spell. This was back in 1932, when farms were cheap. On an off-day in the schedule Doc and his wife were piloted by a real estate agent to a small farm in New Jersey. They looked it over, liked it, and bought.

That night, Cramer suddenly remembered that he hadn't seen a W.C. (water closet) in the farm house they had just purchased. So he penned a letter to the agent asking, delicately, where the W.C. was located.

The agent, mistaking the demure letters "W.C." for Wesleyan Church, replied:

"I have the pleasure of informing you that the W.C. is located about 9 miles from the house and is capable of seating about 200 persons. This distance, unfortunately, is quite far, but if you are in the habit of going regularly you will be glad to know that many persons take their lunch with them and make a day of it. It may interest you to know that a bazaar is to be held to furnish the place with plush seats as this has been a long felt need."

Army Pride

"Birdie" Tebbets, now the property of the Boston Red Sox, was a physical instructor at a Florida Army encampment during World War II.

Of all the screwy shenanigans the smart "Birdie" observed during his enforced leave-of-absence from base-

ball catching duties, Tebbets recalls this happening with the most relish:

A sham battle between rival regiments was supposed to test the acumen of competing army "brass." During a lull in the mock hostilities, a newly-commissioned chaplain disappeared for a few days. Upon his return to headquarters he reported:

"Colonel, I have infiltrated into Ma'or Blitzwitz's camp, and converted 15 of his privates to Christianity."

The Colonel popped red flesh from the confines of his collar.

"Lieutenant Macsiewicz," he roared, "line up 30 privates, and have them baptized. That blanket-blank such-and-such of a Major can't beat ME!"

Sic Semper Diagnosticians

Midway in the 1947 baseball season, pitcher Freddie Hutchinson complained about sore back muscles. Every time he threw a baseball, he declared, his eyes popped and his ears heard the whang-g-g of gongs.

This evidence of something-gone-awry was enough for Steve O'Neill, Hutchinson's manager. "Hutch" was sent to a clinic forthwith. After receiving the one-two-three from the clinic diagnosticians, the Detroit pitcher underwent:

- (1) the removal of his tonsils;
- (2) the extraction of five teeth; and
- (3) an operation for hernia.

And still "Hutch" was "off his feed."

So the general manager of the Tigers forwarded Hutchinson's still-palpating body to New York's greatest medic. The latter decreed:

"This man may never live to see his next birthday. Keep him comfortable. I wash my hands of this case."

That did it, "Hutch" decided that if medical scientists thought he was a "goner," he might as well have some fun out of life during his last moments. So he bought a new convertible, drank all the malted milks he could hold, and ordered a dozen expensive white shirts from a custom tailor.

Groggy after five chocolate malteds, "Hutch" arrived at the latter's establishment for a fitting.

"Okay," said the shirtmaker, "let's get your measurement. Hmm, 34 sleeve, 16 collar—"

"Fifteen," Hutchinson corrected him.

"Sixteen collar," the shirtmaker repeated, measuring again.

"But I've always worn a 15 collar," said "Hutch."

"Listen," the shirtmaker said, "I'm warning you. You keep on wearing a 15 collar and your eyes will pop and you'll have a ringing in your ears."

Sequel to this story:
The New York Yankees arrived in

Detroit two days later, riding the crest of a 19-game winning streak. One more victory would have given the Yanks a new record for consecutive wins. But they ran smack into a collar-freed Hutchinson. He shut them out, 8-0, with a magnificent two-hitter. He struck out eight, walked none, no Yank reached second base, and he faced only 28 men.

Assault-and-Battery Excused

"Sister," said the deacon severely, "you should avoid even the appearance of evil."

"Why, what do you mean?" asked the devout wife of a ballplayer anxiously.

"I observe," he said, "that on your sideboard you have several cut-glass decanters, and that each is half-filled with what appears to be ardent spirits."

"But, deacon," she protested, "I never keep liquor in the house. But brown bottles look so pretty on the sideboard that I fill them half-way with a mixture of floor-stain and furniture polish, so that they'll catch the sunset's glow."

"That's why I'm cautioning you, sister," rejoined the deacon. "Feeling a trifle faint, I helped myself to a dose from the big decanter in the middle."

What Are We Waiting For?

Picking up a new lease on life as Physical Education Instructor at a State Reformatory, the ex-college gridiron star was explaining the game of football to his tough charges.

"Remember," he admonished, "if in doubt about the right play to call, kick the ball."

"And," he added, as a humorous after-thought, "if you can't kick the ball, kick a man on the other side."

The lecture ended on this note, and the prisoners raced out to the gridiron.

"Okay, boys, let's get going," shouted the coach.

"Uh, er, who's got the ball?"

"Hell with the ball," growled one of the youthful inmates. "Let's start the game!"

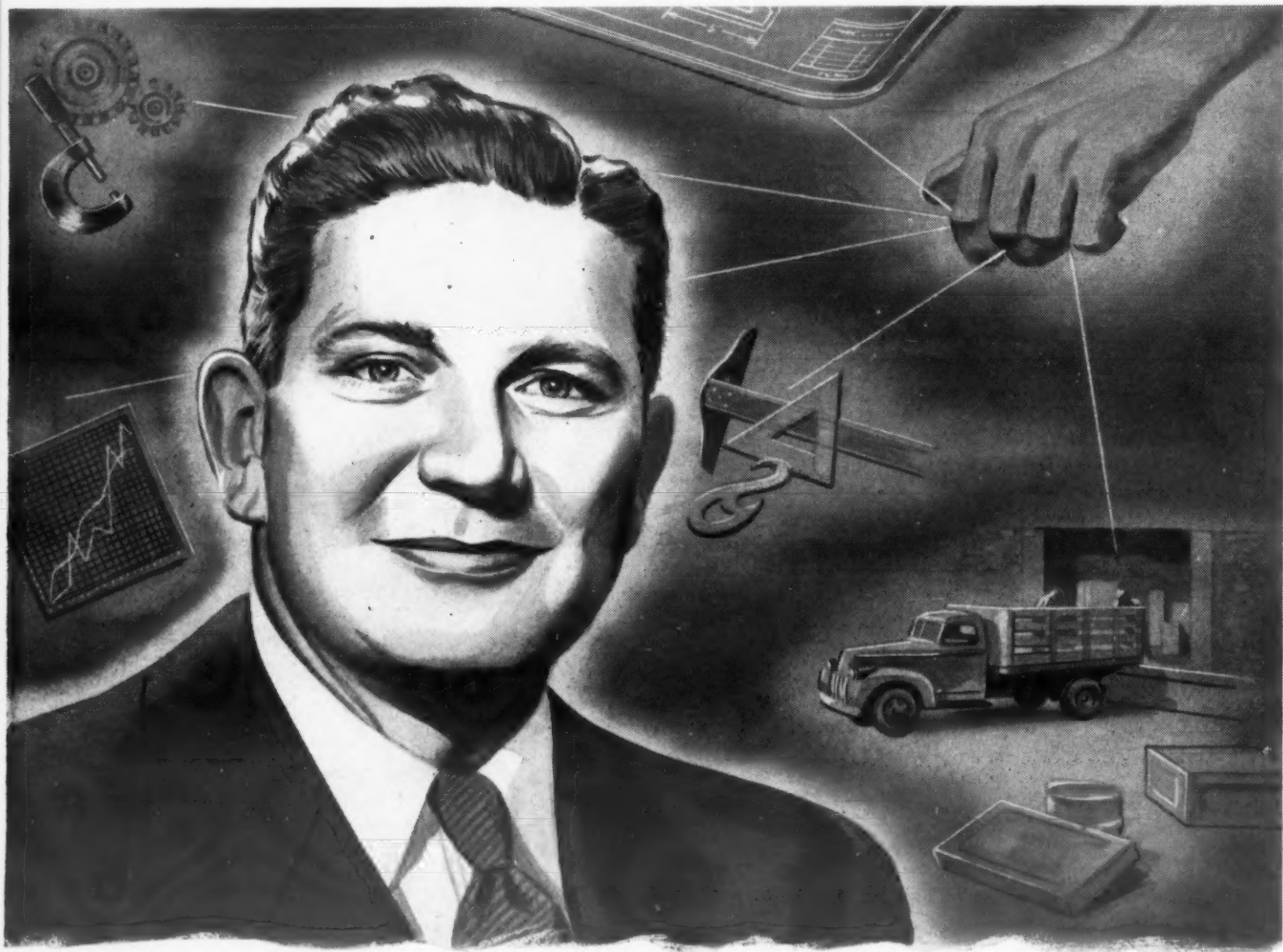
Another Sports Story

Inspired by our recent series of anecdotes about professional athletes, a subscriber (who desires to remain anonymous) has written us as follows:

"At golf I'm a dub. But nobody can take this away from me: I sank a hole-in-one."

"On the seventh hole out at Red Run, I used a No. 2 iron. The four-some ahead of us testified that my first swing lofted my ball into the cup. However, the ball nestled against the rim of the cup—far to the side of the pin."

"You sliced again," murmured my partner.



MEN ARE THE MEASURE OF A COMPANY'S SUCCESS

Curtis M. Brown, General Manager, Refrigeration Division, joined Tecumseh Products Company in 1933. Remember? Not a very promising year in which to leave a secure position with an established concern to take a "flyer" with a newcomer to the industry.

But the incentive was there . . . it was a challenge . . . it was an opportunity. And Tecumseh needed his abilities and experience in engineering, production and sales of domestic and commercial refrigeration equipment.

It turned out to be a good deal all around. "Brownie" has had the opportunity to test and prove many of his "radical" ideas . . . and he has been rewarded for them. Tecumseh Products Company, on the other hand, owes much of its measure of success to his able and effective coordination of engineering, production, management and sales.

TECUMSEH PRODUCTS COMPANY
Tecumseh, Michigan



STANGARD

Prime Surface

COLD PLATES

For Maximum
Refrigerating Efficiency



THE STANGARD-DICKERSON
CORPORATION

46-76 Oliver Street • Newark 5, N. J.
STANGARD KNOWS REFRIGERATION

Copyright 1945 by The Stangard Dickerson Corporation

Truck Trailer Association Preparing For Standard Recording of 'Reefer' Conditions

Need Is Seen In Growth of Perishable Food Handling

WASHINGTON, D. C.—The Truck-Trailer Manufacturers Association discloses that consideration is being given in the highway freight trailer-building industry to introduction of automatic recording instruments for the perishable foods transportation branch of motor service, at least in connection with the heavier types of vehicles and the longer hauls.

Heretofore, the association explained, most of the temperature recording on mobile highway units has been for the purpose of studying and testing operating performance of various insulations and refrigeration systems.

It was pointed out that reliable documentary evidence of maintenance of proper temperatures is assurance to the shipper, the carrier, the consignee and the ultimate consumer that perishable foods have been kept in safe condition at every stage.

Trailer operators, the association said, are well aware of the importance of maintaining the required temperature level when hauling perishable foods, especially frozen foods. Motor transporters have been equally aware of the desirability of having a visual and permanent record of the cargo temperatures during the haul—a proof of premium operation.

The association report described progress made through cooperation of a well known instrument company, a prominent trailer manufacturer, and a motor carrier.

An initial automatic instrument, the association revealed, was mounted on a refrigerated trailer in regular service of the motor carrier. A special vibration-free mounting was devised by the trailer manufacturer. Performance of this instrument still is being studied as to operational details, and if results prove out as have been indicated, it is expected that further installations will be made by the trailer manufacturer.

The instrument and installation were described as follows:

For the purposes of compactness, and in order to assure ruggedness, a 10-inch diameter die-cast aluminum instrument case was utilized. This case is gasketed to render it dust-proof and moisture-proof. The recording chart itself is 8 in. in diameter with provision for a continuous seven-day record. The chart records temperatures from minus 40 degrees to plus 110 degrees Fahrenheit, and is rotated by a seven-day, hand-wound chart drive.

A special "bucket-type" non-corroding stainless steel pen is provided with a stable pinion and gear adjustment to insure proper pen position. This pen provides a continuous ink record of temperatures as determined by expansion and contraction of a gas-filled thermal system. The thermal system consists of a remote steel bulb which is located within the trailer body and which is connected to an instrument-contained helix by means of bronze armored capillary tubing. The bronze helix has been heat-treated to insure permanent calibration, and resultant accuracy is within plus 0.7 of 1° F.

The recording instrument is mounted flush with the outer surface of the rear door of the trailer. Its

record thus is visible to the public, and the consignee can study the record of haul temperature conditions before opening the doors and receiving his cargo.

The thermal system bulb is exposed to the internal temperature of the trailer body by being placed high up and near the center of the end. This approximates the warmest point inside the trailer, since the refrigeration unit is located at the opposite end of the body and all warm air tends to congest upward.

Thus, the records made are indicative of the temperature in the warmest part of the trailer body, and, consequently, if temperatures have been maintained within the proper and desired range, it follows that the bulk of the cargo will have been kept well within the correct temperature limits.

Cincinnati Department Store Puts Frozen Food Dept. In Garage Building

CINCINNATI—The Shillito store, one of the largest department stores in the city, has opened a frozen food section located in the large and recently opened garage building, directly opposite to the large main store.

In addition to the food department, the garage building also houses the auto supplies and sporting goods departments.

The items on display in the store are sold direct to the customers. They cover a varied line and can be seen in the open refrigerated cases. There is another section located in an outlying part of the city, where orders are filled and delivered by refrigerated trucks at stated intervals.

The latter operation is called the home delivery service, and takes care of phone orders, the same being delivered at stated times during the week.

Large and Small Trailer Solve Delivery Problem

LAS VEGAS, Nev.—The problem of delivering heavy appliances with a minimum of manpower and without injury to soft lawns has been solved by the Sandall & Davis Co. here, with a small trailer which is pulled behind a regular passenger car.

A larger companion trailer, too heavy to run across lawns, solves the problem of furniture deliveries for them and saves the expense of a delivery truck.

Both trailers are padded to prevent marring highly polished surfaces. When level, they are 18 in. off the ground. A single axle has the double advantage of making the trailers easy to handle behind a car, and making it possible to raise or lower the back end to facilitate loading or unloading.

The cost of the large trailer is less than that of a special truck body of equal carrying capacity and completely eliminates the cost of the truck.

Rema Names Committee On Market Development Headed by Searls

PITTSBURGH — Jack Searls of White-Rodgers Electric Co. has been named chairman of recently organized market development committee of the Refrigeration Equipment Manufacturers Association, Edward M. Flannery, president of the Association, has announced.

Chosen to serve with Mr. Searls are: A. R. Benua, Ebco Mfg. Co.; M. W. Knight, Peerless of America, Inc.; Israel Kramer, Kramer Trenton Co.; John M. Schlemmer, General Controls Co.; G. W. Wilson, Henry Valve Co.; and John E. Wilson, Jr., Wilson Cabinet Co., Inc.

H. F. Hildreth, who has accomplished the preliminary work in setting up the committee, will be an ex-officio member, Mr. Flannery said.

He indicated that the committee will attempt to gather marketing statistics of member firms and break them down by sales areas.

#46,425,941 Wholesale Value Commercial Cond.
Units Sold 1st Quarter '47
 300,255 AIR COOLED
 50,125 - 1/4 H.P.
 54,210 - 1/3 H.P.
 22,889 - 1/2 H.P.
 22,809 - 3/4 H.P.
 open type

Retail sales up 16.8%
 1947 Est. \$113,000,000,000
 Billion that is!

312,245 commercial units

135,000 miles of new power lines in 44 states
creates 396,000 new electrified consumers

average wages \$48.86
new BLU-COLD water cooled units now

BLU-COLD national consumer advertising - over 250,000 readers

10 POINT CHECK LIST
 use it talk it

"Pay Attention to the figures!"
says THE LEHIGH TEAM

Lehigh BLU-COLD COMMERCIAL REFRIGERATION

1/4 to 2 H. P. AIR COOLED
3/4 and 1 H. P. WATER COOLED
FULL LINE TO INCLUDE UP TO 5 H. P.

NEW! 1/4 H. P. PACKAGE UNIT

Lehigh Mfg. Co. LANCASTER, PENNA.

PURO Electric
WATER COOLERS
 BRANCHES IN PRINCIPAL CITIES
 MAIN OFFICE
 440 LAFAYETTE ST., N.Y. 3, N.Y.
PURO FILTER CORP. OF AMERICA
 DRINKING WATER SPECIALISTS FOR 30 YEARS

WILSON REFRIGERATION, INC.
 • FARM AND HOME FREEZERS
 • REACH-IN REFRIGERATORS
 • WALK-IN REFRIGERATORS
 • FARM MILK COOLERS
 DIVISION OF WILSON CABINET CO., INC.
 SMYRNA, DELAWARE

Bowen
REFRIGERATION
SUPPLIES, INC.

Atlanta Jacksonville
Tampa Miami Charlotte
"The South's Largest
Refrigeration Supply Jobber"

REFRIGERATION **New**
and Air Conditioning
PARTS Catalog
and
SUPPLIES
FOR
WESTERN STATES
REFRIGERATION TRADE
Write For Your Copy Today!
REFRIGERATION SERVICE, INC.
3109 BEVERLY BLVD., LOS ANGELES 4, CALIF.
PHONE EXposition 3111

PAR REFRIGERATION
EQUIPMENT

Tops in
PERFORMANCE
ECONOMY and
EFFICIENCY

Lynch Manufacturing Corporation
General Offices, Toledo 1 - Factory, Delaware, Ohio, U.S.A.

What the Dealer Selling Freezers Should Know About Using Them

Second In a Series by One Who 'Pioneered' Freezers

If it will be any help to you, I will designate a number of things that we use the freezer box for every day in our home and have used it so for many years.

We freeze all the bread that comes into our home. I think most of you know about freezing bread, but how many of you know any real good reason for this?

You might say, "Well, to keep it fresh." And it does do that. However, this is not a very good reason. I'll tell you why we freeze bread in our home. It is so we may have a variety of breads.

My mother, who is very aged, doesn't like anything but white bread. And some doctor had sold my wife on the idea that she should eat nothing but whole wheat bread. I don't like either one of them—I like raisin bread. And we each have just the kind of bread we like whenever we want it by virtue of keeping it in the freezer box.

We buy anywhere from one dozen to two dozen loaves of bread at a time as well as a supply of coffee cake, rolls, etc., and put them in the freezer. The result is that we have a variety of bread on the table at almost every meal.

After the bread is frozen, you simply open the package on the end, take out as many slices as you like, twist the package back up again, and leave it in the freezer until it

is consumed—but having absolutely fresh bread at all times.

You will find that you will enjoy bread a great deal more when you can deviate without having to either eat one or two loaves up before making a change.

Let me warn you, too, at this juncture, always slice your bread or see that it is sliced before you freeze it as it doesn't slice very readily after it is frozen, although it thaws out for eating in just a few minutes.

20 Pies at a Time

When Mrs. McIntire makes pies, she usually makes from 20 to 40 at a time, getting this problem out of the way for many weeks to come. She makes the pies of different kinds already to put in the oven and at this point wraps them properly so that they will not dehydrate, puts them in the freezer and uses them as she may desire.

I might add here, you do not have to thaw the pies before baking—just pop them into the oven and bake. But you do have an absolutely fresh berry, fruit, or whatever it may be, pie.

They can be baked first but we prefer not baking them until just before you are ready to eat them. Before pie crust is baked, it is full of shortening, or grease, you might say. Therefore, it will not absorb any moisture from its own filling.

Editor's Note: This is the second of a series of articles by Mr. McIntire, who claims to have had a home freezer in use in his own home "at least as long as anyone else, if not longer." He is well known in California and other parts of the West, where he represents the Yorkville Paper Co., for the enthusiasm he generates in both selling and owning a home freezer.

Approaching the subject of the home freezer not as an engineer or as a laboratory technician, but as one who has had years of practical experience with the operation of freezers, Mr. McIntire has much valuable advice to offer those who know that the best step in selling the home freezer is to find out all there is to know about the subject.

Mr. McIntire's articles are protected by his own copyright, and any re-publication without special permission is forbidden.

After baking, the crust is dried out to a point where there is a tendency to draw moisture from its own filling during the period of freezing. But where they are baked just before using, the crust is nice and flaky and the filling is nice and fresh.

At the same time she is making the pies, she usually makes up 10 or 12 pans of biscuits and light rolls which are handled just the same as the pies.

We freeze all our cakes. We do not bake many cakes as we live very close to a fine bakery and they will bake for use in advance just what we want, and we usually have eight or 10 cakes baked at a time.

They are taken home and sliced into servings or squares depending on the shape of the cake, packaged absolutely moisture-proof, and placed in the freezer. And when we want cake, we open the package, take out as many slices as we need for that particular meal, close the package again, and the cake remains fresh and lovely until it is consumed.

On Freezing Salads

We freeze nearly all of our salads in advance. You may wonder how it is done. We freeze most of our salads in unflavored gelatin. That is, the salad is prepared whether it be macaroni, fruit, vegetable, or whatever it may be, put into the gelatin and the gelatin allowed to set. Then it is frozen.

I note recently Mrs. McIntire has been freezing her salads in little paper cups like you see around most water coolers. The gelatin is allowed to set in the cups with the salad in it, of course. They are then placed in the proper kind of cellophane bags, the bags sealed, and the whole put into the freezer box.

When she serves the salad, she takes out as many cups as she desires, grasping them upside down with a warm damp cloth, and they pop right out on the salad plates on which nice crisp lettuce leaves have been placed.

If you want to do a really nice fancy job, slit this cone of salad from top to bottom two ways, letting the four quarters fall back on the lettuce leaves, drop a cherry in the center, and put on your favorite salad dressing. You will have a delightful salad and it is on hand at all times ready to serve. Mighty handy when the girls gather to play bridge.

Save the Meat 'Stock'

Meat stock is the most valuable part of all meats for the reason that it contains the greatest amount of vitamins as well as flavor. But in the American home today, 90% of all meat stock goes off down the drain or into the garbage pail for the reason that without a freezer box we have no way of preserving it for any great length of time.

We save and freeze all the meat stocks in our home and I want to tell you that when you make soup with your home frozen vegetables at

a later date, this meat stock just makes the difference between the ordinary flat soup and wonderful flavorful soup. If you want something really good, just cook up a batch of wild rice, cover it with chicken stock, and you will say you have really never eaten before.

How To Save on Eggs

We freeze eggs all the time and find that we make a tremendous saving by doing so. During the summer period, when eggs are low priced, we freeze a supply as against the fall and winter when they always go way up in price. By actual test, I found that in an eight-month period we saved enough in eggs alone to pay the electric current needed for running our freezer box as well as the rental on a locker which we have downtown in Escondido.

We used to have our own chickens, but I have disposed of them for I found it much less expensive to freeze eggs during their low-priced period than it was to feed the chickens and, of course, we have done away with the muss and fuss of caring for them.

You are probably wondering how you freeze eggs. We break them into a bowl and stir them until the yolks and whites are thoroughly mixed but not beaten, pack them into meal sizes, and freeze them. And frozen this way, they are absolutely perfect for scrambled eggs or cooking.

We have some friends in the city of Los Angeles. They visit us on the ranch a great deal and the wife has been urging her husband to buy a ranch and live on it, but he is not selling very well on the deal.

I recall one morning we were eating breakfast at our home at which we had served, among other things, scrambled eggs. This lady said to her husband, "Now, Merrill, isn't it nice to live down here in the country where you can have nice fresh eggs every day for breakfast?" Now these eggs had been in our freezer for over four months but were exactly like fresh-laid eggs.

For poaching and frying, we break them out of the shell into little paper water cups, as you cannot freeze them in the shell so far as I have been able to learn. But we break them into these cups, as I say, and freeze them just that way, and then they are used at a later date for frying and poaching.

The only time you have left-overs in your home is when you are so full of that particular food that you don't want to see any more of it for a long time. However, in the past, it has been necessary to consume it within a few days or throw it away.

We freeze all of our left-overs and leave them in the freezer for long periods, or until such a time as our appetites tell us we would like that particular food again. The only fellow in our house who doesn't like the freezer box is Cinco—that's my dog.

We effect great savings in turkeys.
(Continued on next page)

EXTRA LARGE



UNIT No. 720
55,000 B.T.U. Per. Hr.

Capacities
NOW
AVAILABLE

UNIT NO.	B.T.U.	PER HOUR
52	10 T. B.	15 T. B.
83	2500	3800
96	4100	6200
133	4700	7100
159	6640	9900
212	7950	11900
265	10600	15900
360	13250	19900
480	18000	27000
720	24000	36000
	36500	547500

WIDE RANGE
OF SIZES

COOLMASTER

by **KRAMER**

Many new improvements have been added to the COOLMASTER—a proven superior line of Product Coolers. (for 36°F. Range.)

Write for Bulletin R-125

KRAMER TRENTON CO. Trenton, N. J.

TRACE
REFRIGERANT
LEAK DETECTOR

TRACE...
...ITS STABLE VIVID
COLOR REVEALS LEAKS
INSTANTLY.

THAWZONE
PATENTED
The PIONEER FLUID DEHYDRANT

THAWZONE...
...ACTIVE, CIRCULATING
...DESTROYS MOISTURE
CHEMICALLY, ECONOM-
ICALLY, EFFECTIVELY.

HIGHSIDE CHEMICALS CO.

195 VERONA AVE.
NEWARK 4, N. J.

Admiral Byrd's Equipment Helps Promote a Home Freezer Promotion



An exhibit of the equipment used by Admiral Richard Byrd on the trips he made to both the North and South poles helped to draw attention to the home freezer promotion program put on by the Cincinnati Gas & Electric Co. The exhibit was said to be the first to be permitted by Admiral Byrd. It helped to create interest in the daily lecture-and-demonstration program on the use of home freezers sponsored by Cincinnati Gas & Electric Co.

Dealer Describes How 'Attitude' on Freezer Varies by Income Class

PITTSBURGH—"If you are having trouble selling home freezers to your customers, get your pencil out and show that customer how much money he actually can save with large purchases as compared with small-lot purchases, today," says C. B. Connelly, manager, Quick Service Electric Co.

"People earning more than \$6,000 a year feel they need a home freezer," says Mr. Connelly, "and are interested in the 12 and 16-cu. ft. sizes.

"People earning from \$6,000 down to \$3,000 as yet aren't 'sold' on the home freezer. People earning from

\$3,000 down, believe they have enough space for frozen foods in their own refrigerator.

"Education should sell home freezers to people," says Mr. Connelly. "We haven't sold one-tenth as many home freezers as we've wanted to, but frosted food company advertising to educate people is helping us a lot."

Stangard-Dickerson Is Cutting Plate Prices

NEWARK, N. J.—Stangard-Dickerson Corp. here has announced a reduction in the prices of their line of plate-type refrigeration evaporators effective Oct. 1.

Increased steel supplies and the attainment of greater production helped to make possible the reduction in prices, reports Victor J. Moss.

What You Should Know About Freezers--

(Continued from preceding page)

There is considerably more meat on one-half of a 30-pound turkey than there is on a 15-pound turkey.

The bone or frame of a turkey grows to a certain size and after that all the weight gained by the fowl is meat. So we buy a large turkey, take it to a butcher shop where they have a power saw and have it split in halves, using one half immediately usually and packaging the other half to save until such a time as we again want turkey.

Tricks In Freezing Juices

We freeze many different kinds of juices—loganberry, blackberry, grape, and citrus juices—and they are just splendid, particularly during out-of-season times when you can't get them except canned or bottled, which is all together different from fresh juices.

In freezing juices, we use M.S.A.T. cellophane bags, and protect them with an outer carton.

With frozen juices, particularly citrus juices, after you have melted it, if you will pour it back and forth from one container to another seven or eight times, it seems to airate it and bring it back to the taste of freshly picked, tree-ripened fruit.

We freeze all of our vegetables and fruits, freezing them, of course, at the times that they are in season

and having them to eat just as fresh as the day they were picked during the out-of-season times.

I am telling you these things, hoping that you make notes of it and start building up a SELLING STORY on freezer boxes because, please believe me, the seller's market is about a thing of the past. If you expect to sell freezers, you are going to have to convince people that they need them.

Just look around you! A few months ago, you or your wife waited in line for hours to get one pair of nylon hose. Now you can buy both nylon and silk hose in any block in Los Angeles almost.

Look at your filling stations! Everyone of them has tires sitting out in front with a price tag. Go into appliance dealers stores! Table model radios are sitting all over the place.

Use Knowledge To Sell

No, we are back to normal—and that's what we have been asking for but we are going to have to SELL goods.

These fresh frozen foods, breads, and pastries are tremendous money-savers and, more than that, save the housewife much worry and work. It also enables her to serve fresh foods out of season and be a delightful hostess with very little muss and fuss.

I live 17 miles from the Del Mar Race Track—and I am not bragging about it because it is a costly situation; too easy to get over there.

During the racing season, I have lots of company which I just love. We usually meet them over at the track on Saturday noon and stay through the eight races. By the last race, it is usually getting pretty well towards dark.

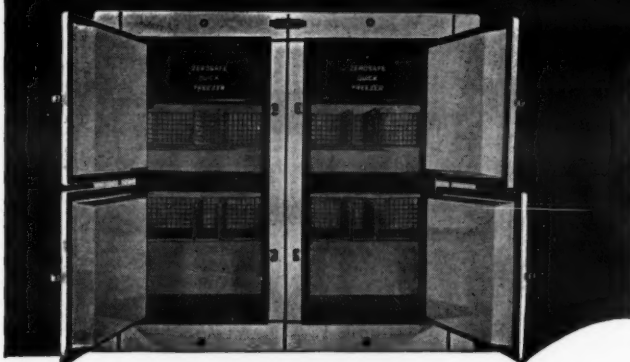
There are now from 15,000 to 30,000 people dumped out of the track at one time, and just try to get anywhere near a restaurant! And so far as my case is concerned, try to have 50 cents left in your pocket to buy a meal with after the races—even if you could get into the restaurant! The result of it is that we usually go over to the McIntire's for dinner which, under normal circumstances, would be a real burden on my wife, but with our freezer, it presents no problem at all.

Last Labor Day, I had four guests who came home with us, which, with the three in our family, made seven. Mrs. McIntire prepared dinner for all of us and I happened to note the time that evening. In just 45 minutes, she had a lovely meal ready and we were sitting down to eat—and she hadn't changed clothes or even put on an apron.

And here is what we had at that meal: steak, biscuits and gravy, fresh corn from the freezer, fruit salad, four kinds of bread, two fresh berry pies, and part of the guests had ice cream and cake. Perhaps this will indicate to you what a real LABOR-SAVER a freezer box can be.

(To Be Continued)

SINCE 1939...ZEROSAFE by WILSON



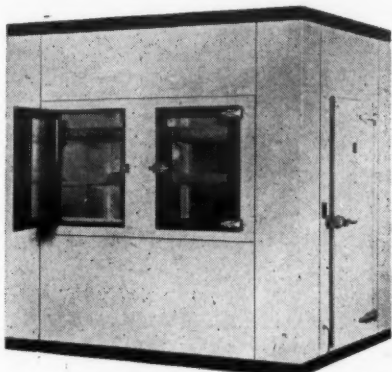
WILSON ZEROSAFE FARM FREEZER
Sectional Model FF-60

FOR FRANCHISE INFORMATION ADDRESS DEPT. II, WILSON REFRIGERATION, INC., SMYRNA, DELAWARE

THE GREAT NAME IN FREEZER DESIGN

SINCE 1939 Wilson ZEROSAFE has been the greatest reach-in farm freezer in America... THE NEW WILSON ZEROSAFE IS NOW GREATER THAN EVER BEFORE... Not a toy, but big, ruggedly beautiful, efficient, with stamina for years of low-cost operation.

SIZES FOR EVERY NEED FROM 15 TO 120 CU. FT.



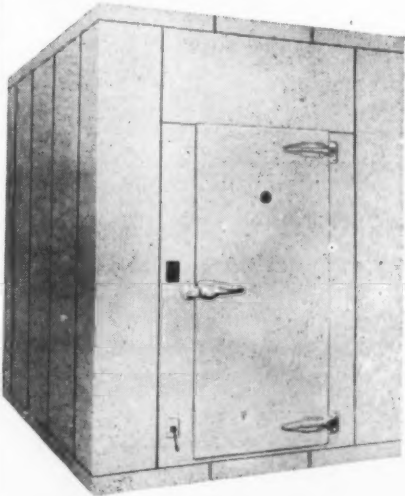
Service door model, 2 sides white enamel with black trim. Large variety of sizes up to six service doors.

BEAUTY IN EVERY LINE-
QUALITY IN EVERY INCH



DELIVERIES
WITHIN 2 WEEKS

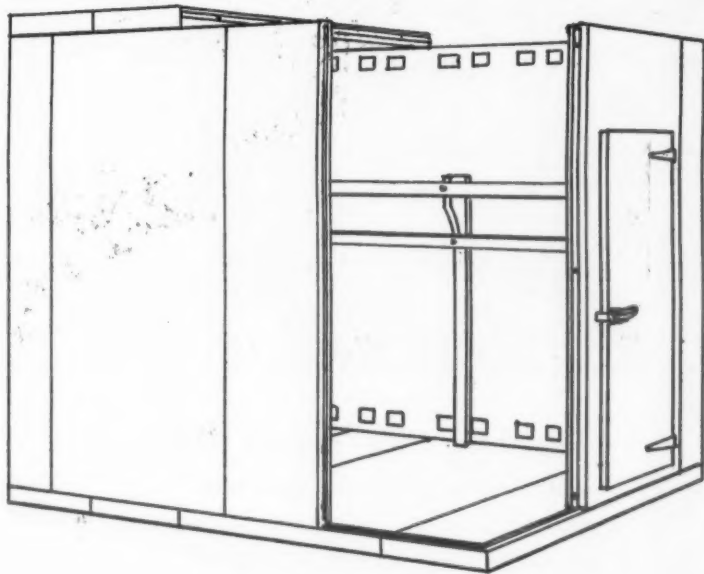
Storage cooler, all sizes, for meats, vegetables, beer, etc., finished grey lacquer.



Next to a miracle—
so easy and quick to erect!

MIRACOOOL
SECTIONAL ALL-STEEL
WALK-IN COOLERS

Sections are bolted together on inside and made invisible. Just follow instruction sheet tallying with numbers marked and each section, double gasketed, comes together with perfect ease, for years of safe cooling. Cooler can be reconstructed any time to add sections for larger size or rearrange position of doors or walls.



NEVER BEFORE HAS ANY OTHER COOLER
MET WITH SUCH INSTANT ACCEPTANCE.

ASK ANY MIRACOOOL DEALER! HE WILL ALSO
TELL YOU OF THE MANY SATISFIED
CUSTOMERS AND REPEAT SALES.

Send for illustrated folder

The CLEVELAND REFRIGERATOR Co.
2901 E. 65th St. Cleveland, Ohio

Before buying
ANY
Beverage Cooler
See the
Perfected
GENERAL
Dry Beverage Cooler
GENERAL REFRIGERATORS CORP.
Manufacturers
678 Broadway, New York 12, N. Y.

REFRIGERATION
INFORMATION IN A HANDY FORM

NOW READY
Audels Refrigeration and Air Conditioning Guide. Highly endorsed for Engineers, Servicemen, Shopmen. Covering modern Principles, Servicing, Operation & Repairs of Household, Special, Commercial & Industrial units. Including Freon, Quick Freezing Lockers, Water Coolers and Air Conditioning Systems. ANSWERS YOUR QUESTIONS 1250 pages, 46 chapters All Fully Illustrated and Indexed for Ready Reference

\$4 COMPLETE • PAY ONLY \$1 A MONTH
Get This Information for Yourself, Mail Coupon Today. No Obligation Unless Satisfied. ASK TO SEE IT.

AUDEL, Publishers, 49 W. 23 St., N. Y. 10
MAIL, AUDEL'S NEW REFRIGERATION GUIDE for free examination. If O. K. I will send you \$5 in 7 days; then remit \$1 monthly until price of \$4 is paid. Otherwise I will return it.

Name _____
Address _____
Occupation _____
Employed by _____ R12

TRADED-IN
REFRIGERATORS...from 2 to 18 cu. ft.

FRIGIDAIRE • GENERAL ELECTRIC
HOTPOINT • KELVINATOR • NORGE • PHILCO
WESTINGHOUSE and OTHER FAMOUS BRANDS

ATTRACTIVELY PRICED for PROFITABLE RESALE

METRO REFRIGERATOR CO. 44-3rd Ave., New York 3, N. Y.
A Continuous Reliable Source of Supply

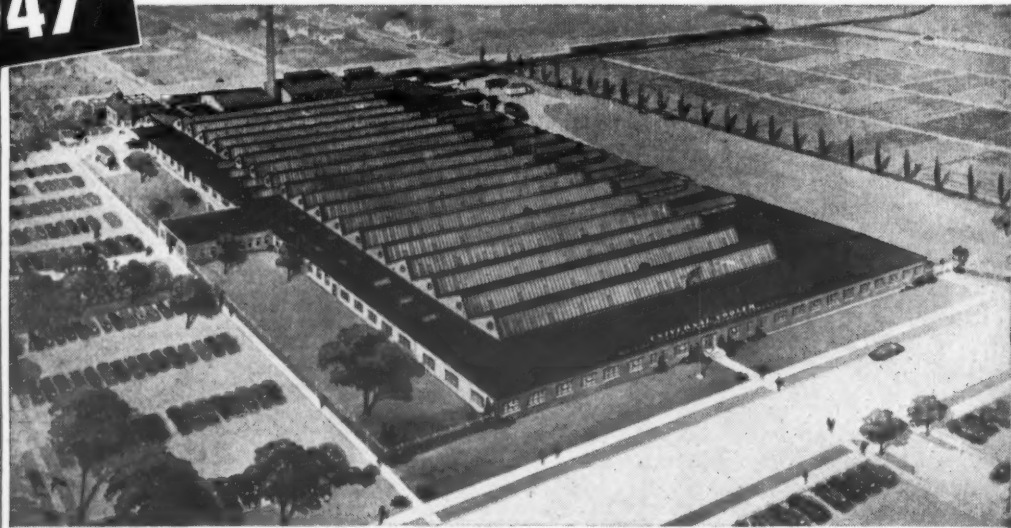
They'll Do It Every Time By Jimmy Hatlo



It's Time To SELL Again!



MODERN MASS PRODUCTION



Electric Refrigeration was an infant industry in 1922, when Universal Cooler produced its first 34 units. Today, to meet the increased demand for efficient, economical refrigeration, Universal Cooler produces hundreds of thousands of units annually.

Universal Cooler enters its second quarter century of service confident of its ability to maintain, through continuous engineering leadership, the high standards of perfection inherent in every Universal Cooler product.



Universal Cooler
DIVISION
INTERNATIONAL DETROIT CORP., MARION, OHIO
In Canada: UNIVERSAL COOLER CO. of Canada, Ltd., Brantford, Ontario

Hermetically sealed, open type self-contained and remote units exclusively for leading manufacturers. 1/4 to 15 h.p.

AN INTERNATIONAL INSTITUTION • SUBSCRIBERS ALL OVER THE WORLD

Trade Mark
registered
U. S. Patent
Office:
Est. 1926



Copyright
1947,
Business News
Publishing Co.

F. M. COCKRELL, Founder

Published Every Monday by BUSINESS NEWS PUBLISHING CO.
450 W. Fort St., Detroit 26, Mich. Telephone Randolph 0924.

Subscription Rates: U. S. and Possessions, Canada, and all countries in the Pan-American Postal Union: \$4.00 per year; 2 years for \$7.00. All other foreign countries: \$6.00 per year. Single copy price, 20 cents. Ten or more copies, 15 cents each; 50 or more copies, 10 cents each. Send remittance with order.

GEORGE F. TAUBENECK
Editor and Publisher

PHIL B. REDEKER, Editorial Director

C. DALE MERICLE, Associate Editor
JOHN SWEET, Assistant Editor
ROY DENIAL, Assistant Editor
HUGH MAHAR, Assistant Editor
GEORGE HANNING, Assistant Editor
Editorial Assistants: FRANCES WEED,
MARCELLA PRICE, MARGARET DEAN

E. L. HENDERSON, Business Manager
ELIZABETH SMITH, Assistant Bus. Mgr.
ROBERT M. PRICE, Adv. Representative
ALLEN SCHILDHAMMER, Adv. Rep.
YVAUGHN CRYSLER, Subscription Mgr.
WALTER J. SCHULER, Production Mgr.
ROBERT P. NIXON, Credit Manager

Member, Audit Bureau of Circulations. Member, Associated Business Papers.

VOLUME 52, No. 5, SERIAL NO. 967, SEPTEMBER 29, 1947

Air Conditioning Industry's Biggest Problem Is The Recruiting of Salesmen

"HOW may AIR CONDITIONING & REFRIGERATION NEWS be most helpful in developing the market for air conditioning?"

We put this question to an Over-all Industry Committee meeting recently; and, after giving the matter some thought, this committee's spokesman answered: "Help us get salesmen."

Said spokesman agrees that selling the idea of air conditioning to The Public is not the big problem. At the same time, he admitted that specialty selling organizations are skeptical about their future in this business.

"We have been working on the air conditioning market for years," individual members of this committee said. "We have made a thorough survey of each potential market for packaged air conditioning units. Our lines of equipment are engineered from the ground up to meet the needs of this predetermined market. But, here's the rub: we can't feel sure that we'll sell what we have to offer. Why? because we wonder who is going to do the selling."

It's true that the air conditioning industry is not confronted with too many public-acceptance bogies. Its panting public is way ahead of the game. Eager buyers are embarrassing handicapped producers of packaged air conditioning units nowadays. But this won't last. Some day the cream will be skimmed. Then the industry will need salesmen.

Errant and at-loose-ends electric refrigeration salesmen—particularly those lads who have had commercial refrigeration selling experience—certainly represent a most logical group of possible recruits for the sales manager who is saddled with the job of promoting air conditioning.

Nobody can deny that the enormously successful refrigeration industry has corralled the best specialty-selling brains of our generation. These experienced merchandising geniuses know what it takes to get business in a competitive market, and as sales executives, they are tops. And those who aren't in executive posts probably have remained specialty salesmen because that's what they love best.

Prewar refrigeration salesmen have been trained in a rigorous school. They are willing to work and are anxious to get ahead.

Furthermore, experienced refrigeration salesmen know how to sell performance and customer satisfaction—as against PRICE—but they also know the language of compressors, coils, and controls, and are already prepared to talk technical terms when necessary.

And with such a fertile field to draw upon, it would seem to us that any air conditioning sales manager who overlooks the inherent possibilities in these pre-trained fellows is going at his job the hard way.

However, here's the catch: there aren't many of these men around any more.

We have an idea that all of the air conditioning manufacturers are going to have a tough time finding competent air conditioning salesmen when they will need them most. The chances are that it will be necessary to train most of these embryo salesmen. And that process is rather expensive.

There are a few specialty salesmen still kicking around, however, whose past training and experience should provide an excellent foundation for successful future business. With these old-time, genuine prewar vintage refrigeration salesmen as a nucleus, perhaps the air conditioning industry can begin to assemble the type of sales force it will need in 1948 and beyond.



Which means an
and your Refrigeration Wholesaler's
Counter.

AUTOMATIC PRODUCTS COMPANY

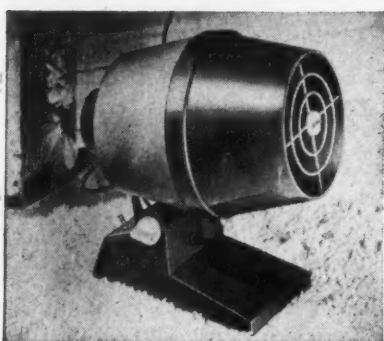
2401 West 10th Avenue, Minneapolis 14, Minnesota
Phone BR 1-1000, BR 1-1001, BR 1-1002, BR 1-1003



Dependable REFRIGERANT VALVES



What's New



Wittie heater-fan combination.

Bullet-Shaped Heater-Fan Designed by Wittie Mfg.

CHICAGO—Wittie Mfg. & Sales Co. here is now producing a new oscillating heater-fan combination that rotates either fan-forced hot air or fan-cooled air throughout a room. A switch controls the transfer from one operation to the other.

According to Wittie, the fan operates on two speeds and heat can be dispersed at two-temperature variations.

For safety, the heating element has been placed deep within the unit and the fan is covered with a guard.

Encased in a bullet-shaped tan and brown shell, the heater-fan has a 7½-in. blade and an 8-in. duct. It measures 12½ in. high, 12 in. long, and 8½ in. wide.

The retail price is \$21.95.

New Frigidaire Apt. Range Features Full-Sized Oven

DAYTON—A small, compact, electric range with a big, full-sized oven is being produced by Frigidaire Division of General Motors for apartment house type installations, according to H. M. Kelley, appliance sales manager here.

The new compact range, the RJ-3, is the "little brother" of the company's brand new RJ electric range line, which is being introduced this year.

"This diminutive range offers practically all of the basic features of the larger models," Kelley emphasized. "For example," he explained, "this apartment house range is equipped with a meal-sized baking, broiling, and roasting oven with heating units located at the top and bottom. There are two shelves that have nine separate positions. Like the larger models, the broiler is waist-high."

The range, itself, which is equipped with three surface cooking units, is 21 in. wide, 26½ in. deep, and 42 in. high, measuring from floor to top of the splash-back. All six sides of the oven are insulated with a thick layer of glass wool. In addition there is an extra layer of insulation across the top to insure an economical operation and a cool kitchen. Corners of the oven are rounded to facilitate cleaning. Oven heat is controlled thermostatically and a single switch

BRIDGEPORT, Conn.—A small electric casserole designed particularly for the preparation of quick "one-dish" meals has been announced by M. B. Ross, manager of the General Electric Co.'s heating device and fan divisions.

The new cooker prepares soups, stews, boiled foods, meat dishes, poultry, casserole dishes, steamed vegetables, desserts, and children's dishes. Used to its full four-quart capacity, it is large enough to cook a casserole dish for eight people.

The casserole is available in two



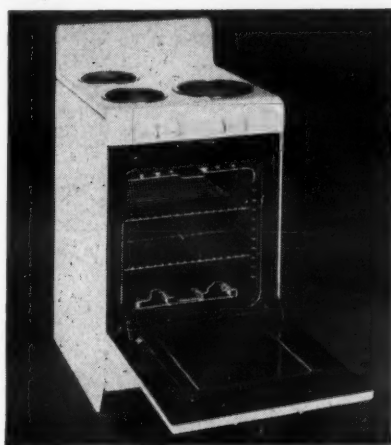
models—one with an automatic temperature control which has a range of 100° to 550° F., and the other with

a two-heat control for both fast and slow cooking.

The automatic casserole retails for \$12.95, plus tax, and the two-heat model for \$9.95, plus tax. Both models will be on sale in retail stores across the country in November, Mr. Ross said.

Weighing only 4½ pounds, the cooker is light enough to be carried from the kitchen to the table, where it can be used as a serving dish. It is 7¼ in. high and 9¾ in. in diameter.

The cooker is finished in white baked enamel and has red Textolite handles for cool carrying. The aluminum cover also has a Textolite knob. Protective wooden feet prevent marring of table tops and work surface.



Frigidaire range Model RJ-3.

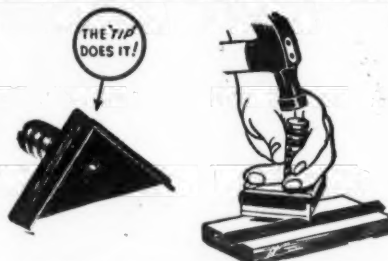
operates baking or broiling operations.

The one-piece steel cooking top extends from the splash-back across the surface and down over the control panel. Base of the new range is rounded enabling it to be moved without marring the floor. The frame is of welded steel and the finish is of porcelain.

Jarrow Gasket Notcher Speeds Replacement Work

CHICAGO—An improved door gasket notcher has been introduced by Jarrow Products Co., designed to help busy refrigeration servicemen.

Common practice, when fitting a replacement door gasket on a refrigerator door, has been to cut wedges in the gasket with a pocket knife so as to be able to bend the gasket into a 90° turn for the corners.



Jarrow Products gasket notcher.

ers. Due to the characteristics of the gasket, this has been practically impossible to do accurately. The result is a bulging corner.

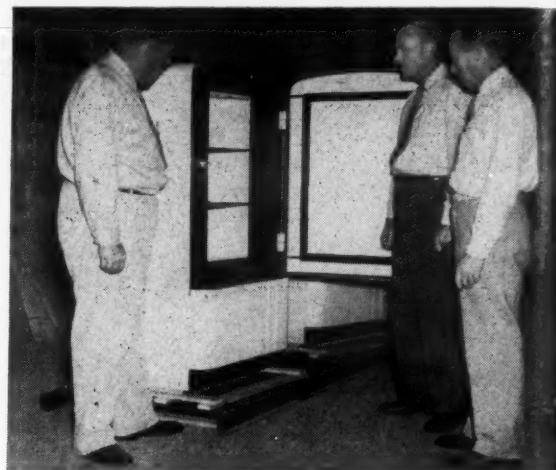
The Jarrow gasket notcher cuts a true 90° angle. At the apex of the angular cut, a small rounded tip of material is removed permitting the formation of a perfectly mitred corner.

Wilson 'Hi-Boy' Home Freezer Has Removable Front

SMYRNA, Del.—A new front-opening, reach-in home freezer, called the "Hi-Boy," which occupies less than a square yard of floor space but stores 200 pounds of assorted frozen foods based on 35 pounds per cubic foot, is being introduced by Wilson Refrigeration, Inc. A. A. Davis, vice president and general sales manager, reported the new product to be as simple to use as a household refrigerator.

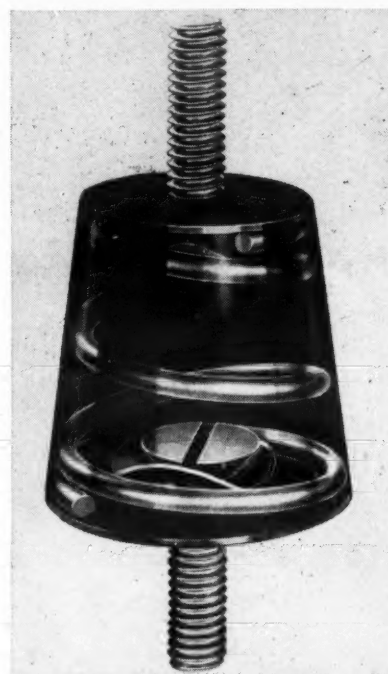
The streamlined Hi-Boy features among other things, a removable front allowing the freezer to be moved easily through the narrowest doors.

The new freezer does not need de-



frosting as often, or in the manner of the domestic refrigerator and it is not necessary to shut-off the power during the defrosting process.

The type RS has a high load capacity, ranging from 25 to 125 lbs. per unit. This combined use of rubber and steel springs, it is claimed, not only increases the load capacity but also provides a wide frequency range for successful isolation. It is effective for pumps at 1,750 r.p.m. and compressors at 450 r.p.m.



Korfund RS conical rubber spring mounting.

Vibration Control Unit Combines Rubber, Steel

LONG ISLAND CITY, N. Y.—A new low-cost vibration control unit, the Korfund type RS conical rubber-spring mounting, has been announced by The Korfund Co., Inc., here.

*It's a
REVELATION
—that's all!*



- ★ Exclusive Dealer Franchise
- ★ Now in quantity production
- ★ All sizes: Industrial and Commercial
- ★ The last word in...

**ELECTRIC
WATER
COOLERS**

Revelation Company
Division of
Interstate Engineering Corporation
2600 Imperial Highway
El Segundo, California

The FOGEL "Lowboy" A Counter Height Case



MODEL 4300 DD



"TRIPLE DUTY"

1. Spacious display area with streamlined eye appeal.
2. Efficient and roomy storage space.
3. Perfect height for scale, slicer, and wrapping packages.

PLUS...

Many other outstanding FOGEL advantages that meet all the practical requirements of your customers' needs for an efficient, beautiful Counter Height case.

Join the many dealers who are "going to town" with this exclusive FOGEL up to the minute case. Feel welcome to write for further information concerning these, or other, FOGEL Quality-Engineered refrigeration items.

Now Available in Several Lengths

One franchise gives you a complete commercial refrigeration line.

FOGEL REFRIGERATOR COMPANY

5400 EADOM STREET • PHILADELPHIA 37, PA.

Quality manufacturers, for almost one-half century, of Display Cases, Reach-Ins, Walk-Ins, and Freezers.

We Manufacture XL

'Freon' Compressors and Condensing Units (1 to 7 ½ h.p.)

Ammonia Compressors 4x4 — 5x5 — 6x6 — 8x8

Ammonia Valves 1/4" to 5" Screwed and Flanged

Hilger 3 Way Valves For Dual Relief

Ammonia Flanges—Strainers—Discharge Check Valves

AIRCRAFT PRODUCTION ENGINEERS

DIVISION OF

THE XL REFRIGERATING CO.

1834-42 WEST 59th STREET

CHICAGO 36, ILL.



No. 502

No. 503

No. 505

Rustproof!

Aluminum Alloy

PILASTER STANDARD

for
Adjustable Wire Shelves
and
Flat Shelving

IMMEDIATE DELIVERY IN

Stock Lengths

36"—42"—48"—60"—72"—144"

Also cut to size on quantity orders.

Write for samples and prices.

**STANDARD-KEIL HARDWARE
MFG. CO., Inc.**

FORMERLY OF BRISTOL, PA.

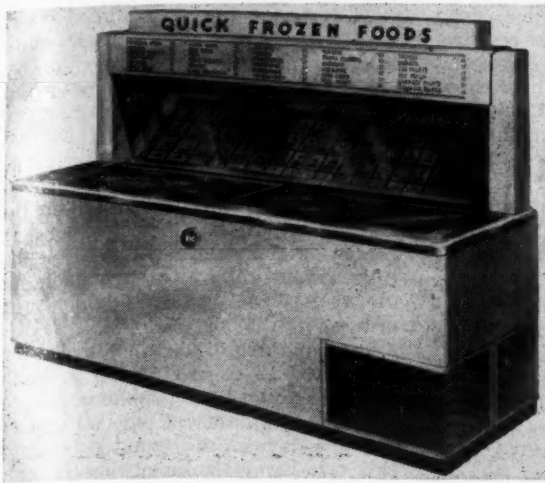
Now Located:

2413-23 Atlantic Ave., Brooklyn 33, N. Y.

Makers of KEIL complete line of
Refrigerator Hardware
Showcase Hardware

What's New (Cont.)

BTC Frozen Food Cases Come In 3 New Sizes



BINGHAMTON, N. Y. — The Brewer-Titchener Corp. has introduced a line of BTC frozen food display cases in 12½, 18, and 23-cu. ft. sizes. The company also manufactures BTC evaporator plates for

commercial refrigeration, and food freezers.

The BTC frozen food display case is entirely self-contained. Cabinet and superstructure are of heavy 16-gauge steel construction, with stainless steel top capping and channels to protect wearing surfaces. The finish is high bake white enamel. Modern design of cases is directed to customer appeal with features such as convenient counter-height, rounded corners, and recessed toe-space for easy access to the frozen food packages.

Twin, double-glass lids trimmed in stainless steel give fingertip sliding for operation of the cabinet with lids on. Full-length angle mirror and superstructure panel for food lists and prices permit attractive displays.



'Chrom-Ever' Mixing Unit Purposely Set Off Center

BOSTON — Featuring interchangeable blades for mixing and whipping, the new Chrom-Ever electric mixer has been introduced here by Asquith Associates, Inc.

Operated by a push button, the mixing unit is set off center because the double motion created in the liquid does a more thorough job of mixing, according to the company.

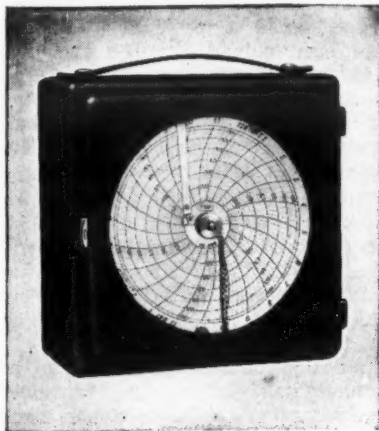
The motor is self-lubricating and is mounted in a non-tarnishable aluminum housing, it added.

A 1-qt. bowl comes with the mixer. The entire unit is made by the Wade-Youmans Co. of Alliance, Ohio.

Immediate delivery is promised by the Asquith firm, which sends out each mixer individually boxed. List price is \$7.95.

Temperature Recorder Has Vibration-Proof Pen-Arm

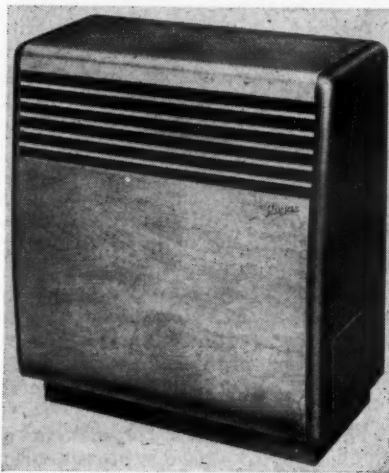
BROOKLYN — A miniature-size temperature recorder, designed for use in the many applications where a shock-resistant, easily portable temperature recording instrument is necessary, has been announced here by the C. J. Tagliabue Mfg. Co., a subsidiary of Portable Products Corp. Said to be the only one of its type



to resist shock and vibration successfully, this new instrument is particularly suitable for use in trucks, railroad cars, and airplanes in transit as well as in other operations where vibration is encountered, the manufacturer said. Because of its small size and portability, it is also useful for checking refrigerating, heating, and air conditioning equipment. The instrument is available in two

forms: the single-pen recording thermometer for recording temperature only, and the two-pen temperature and time-operation recorder, which charts the running time of refrigeration motors in addition to recording temperature. Simplicity of design and construction insures accuracy in recording, it was pointed out.

A special transparent, unbreakable plastic front permits full view of entire chart and pen-arm. Pen-arm is "jiggle-proof," and thus temperature record is unaffected by vibration. The instrument is available in models to operate in a wide variety of ranges. Chart drive is a seven-day spring-propelled mechanism with charts of 24 or 72-hour duration. Each recorder is enclosed in an aluminum case with smooth, black enamel finish. Over-all dimensions are said to be 5¼ in. square, 4¼ in. deep, and total weight is less than 3½ lbs.



Vents In Space Heater Channel Odors Outdoors

BEVERLY HILLS, Calif.—A gas-fired, console type space heater, designed to heat a single room, has been introduced by the Payne Furnace Co. here.

The heater is made in three sizes with input ratings of 25,000, 35,000, and 45,000 B.t.u. It burns natural, manufactured, or L-P butane gas.

Special feature of the unit, according to the manufacturer, is the Payne full venting that carries all moisture and combustion odors outdoors, thus assuring clean and heated air.

A specially constructed base permits free air circulation and prevents damage to the floor or rug, the manufacturer said.

The heater is equipped with an automatic safety pilot, and either manual or thermostatic control.

It discharges heat horizontally to provide better circulation and room comfort, Payne added. Further, it is not necessary to keep the burner going all the time to provide instant heat, the company claims.

Thomas and Wright In New Fiberglas Posts

TOLEDO—John H. Thomas will succeed George E. Gregory as vice president and purchasing director of Owens-Corning Fiberglas Corp., and Ben S. Wright will become Owens-Corning's general sales manager.



Ben S. Wright

These changes, effective Oct. 1, have been announced by Harold Boeschstein, Fiberglas president, following word of Mr. Gregory's resignation from Owens-Corning to become president of the Morton-Gregory Co., Inc., a new organization being formed to manufacture and sell new industrial and consumer products calling for large scale use of Fiberglas yarns.

Mr. Thomas has been Owens-Corning's vice president in charge of sales since 1946. He has been with the firm since it was organized in 1938, and prior to that time was identified with the Owens-Illinois research activities in Evansville, Ind., Columbus and Newark, Ohio, that resulted in the invention and development of Fiberglas air filters, insulating wool, mat, and yarns.

Mr. Wright joined Owens-Corning in 1940 and was assigned to the general office sales organization as manager of the Fiberglas yarns division. In 1945 he became manager of the Fiberglas branch sales office in Cleveland. He returned to the firm's general offices in Toledo last month.

1948 Oil Burner Show April 5-8 In Chicago

NEW YORK CITY—The Oil-Heat Institute Exposition Committee has approved plans for the Silver Anniversary Exposition and Convention of the oil burning and allied industries to be held in Chicago April 5-8, 1948.

O.H.I. contracted for space for this whole industry show over a year ago with the Chicago Coliseum.

In a statement to the committee A. E. Hess, managing director of Oil-Heat Institute, said: "We have contracted for more show space than any preceding year in order to accommodate the showing of a greater number of new products than in any preceding national exposition. Special emphasis will be given new products."

Harris In Ft. Worth Store

FORT WORTH, Tex.—C. M. Harris takes over the position left vacant by the recent resignation of Dorsey Rooke. Mr. Harris is now buyer of appliances and allied lines for Monnig's here.

Design Engineer

Experienced in refrigerator cabinet design. Key position in world's largest plant devoted exclusively to the manufacture of home freezers.

Please write fully concerning education, experience and salary.

Personnel Dept.

DEEPFREEZE Division

Motor Products Corp.
North Chicago, Illinois

KRACK

ENGINEERED

UNIT COOLERS
FIN COILS
AIR CONDITIONING
Refrigeration Appliances, Inc.

923 W. Lake St., Chicago 7, Ill.

FOR SALE ELECTRIC MOTORS

REFRIGERATION TYPES
1/8 - 1/4 - 1/2 - 3/4 - 1 H.P. A.C. Single phase
1750 R.P.M. 110-220 volts R.S.I. and capacitor
60 cycles.

WATER COOLER TYPES
1/8 - 1/4 H.P. A.C. single phase 1750 R.P.M.
60 cycles R.S.I. and Capacitor.

WASHER MOTORS
1/8 - 1/4 H.P. A.C. split phase 1750 R.P.M.
60 cycles 110 volts.
Also have on hand a stock of D.C. motors
compound wound from 1/8 to 1 H.P. 115- or
230 volts.

Write or Wire

P. J. Quinn's Sons Electric Motor Co.
46-15 Vernon Blvd., Long Island City 1, N. Y.
Telephone: Ironsides 6-5940

PROGRESSIVE

Refrigeration Wholesalers
throughout the nation sponsor
the GROUP CATALOG
PLAN

World's
Largest
Producer
of Wholesale
Refrigeration
Parts Catalogs

ADVERTISING INTELLIGENTLY PLANNED
C.R. MARKHAM
Advertising

National Security
Bank Building

767 Milwaukee Ave., Chicago 22, Ill.

WALL AND CEILING
M&E
EST. 1866 **DIFFUSERS**

For all above-freezing uses
CATALOG ON REQUEST

MERCHANT & EVANS CO.
PHILA. 46, PA.

Now in production . . .

GIANT ARMY STYLE

8 FOOT BEVERAGE COOLER WITH A 47 CASE CAPACITY!

★ Available now—the long awaited IDEAL giant beverage cooler! The cooler that made refrigeration history at most of Uncle Sam's largest army camps . . . under gruelling conditions of use!

No ordinary cooler could provide the performance required to take care of thousands upon thousands of thirsty service men. But years of refrigeration "know how" and experience in the beverage cooler field enabled IDEAL to design and engineer an 8 foot standard size cabinet with a capacity of 47 cases of 12 oz. bottle beverages.

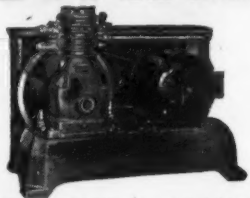
Great for the army, even greater now for civilian use! Just think what this means to your customers—under a standard bar IDEAL is able to cool and serve twice as much bottle beverages as ordinary coolers . . . at no added expense!

These beverage coolers will more than satisfy the most exacting buyers. Here is your opportunity to assure your leadership in your territory with the right cooler . . . a cooler proved by performance! For more information on available territories, write today!



IDEAL COOLER CORP. 2953 EASTON AVE., ST. LOUIS 6, MO.

ALL STAR PERFORMANCE BACKED BY 30 YEARS EXPERIENCE



- DEPENDABLE SERVICE
- RUGGED CONSTRUCTION
- ECONOMICAL OPERATION

GENERAL REFRIGERATION DIVISION
Yates-American Machine Co., Beloit, Wis.

Lipman
AUTOMATIC REFRIGERATION

For Immediate Sale

PRESSURE CONTROLS

1900 CUTLER-HAMMER type 9521-N-51
Normal setting—2 lb. cutout—8 lb. cut in
Adjustable differential and pressure range
Screwdriver adjustment

FLARE NUTS

12,700 Weatherhead forged brass 1/4"

Phone RANDOLPH 6733 or write

WHITING CORPORATION,

38 South Dearborn St., Chicago, Illinois

ALL OR REASONABLE QUANTITY—
LESS THAN COST

Operator Keeps 'Reserve Lockers To Aid Customers

OCALA, Fla.—Barney Howard has recently opened a modern 160-drawer locker plant here, which is said to have a future capacity of 400 lockers. One hundred and forty "runover lockers" have been provided for customers who may at times have too much food for their individual 6-cu. ft. drawers.

In the two 80-locker units, which make up the original 160 lockers, are five sharp freeze drawers provided to quickly freeze food before placing it in the patron's locker.

One of the two 12 by 24 ft. cooling rooms is equipped with Westinghouse "sterilamps" to keep down the bacteria and purify the air while foods are being chilled.

A complete processing department with a special room for dressing poultry is part of the modern plant. In the poultry dressing room are an automatic picking machine and a scalding tank.

The new plant is housed in a white concrete block structure, 50 by 100 ft. Interior walls are white, and the floors are concrete with drains for easy cleaning. Fluorescent lighting is used throughout.

July Appliance Sales Hit Peak

CLEVELAND — Sales of major household appliances by department stores in the Fourth Federal Reserve District during July were the second highest on record for any month and 77% greater than a year ago, according to statistics released by the Federal Reserve Bank of Cleveland.

Licking Stubborn Moisture, Packaging Problems Enables Denver Baker To Expand Quick-Frozen Pastry Line, Increase Sales

DENVER — Quick-frozen bakery products are an enterprise which has resulted in a 25% increase in over-all sales for the Mary Ann Bakeries, chain of two bakeries operated by William Allingham, here.

Allingham for the past six months has operated one of the country's most successful frozen bakery goods programs, largely because he has completely separated this operation from fresh-baked products at his two bakeries in mid-town and South Denver.

The Denver baker went into refrigerated bakery products about six months ago, when he found sales volume dropping from its war-time peak, and didn't want to lose valuable personnel and facilities required during the war.

Instead of "competing with himself" Allingham distributes two types of frozen baked goods through a separate sales organization, headed by his son Jerry, and Fred Baker. More than 90% of a long list of 22 frozen baked items are sold to retail grocery stores, the rest, such as frozen whipped cream cakes, cream puffs, fruit pies, etc. to drugstores and soda fountains.

In August, the company had 70 accounts, all of whom had to be convinced that frozen bakery goods was sufficiently profitable to devote a large amount of self-service refrigerator space to them.

The frozen bakery products are divided into two classifications "ready-to-eat" and "ready-to-bake."

Marketed under the names "Modern Maid" and "Mary Ann," the list includes cream puffs, fruit pies, deep fruit pies, fruit cobblers, cookies, rolls, layer cake, angel food cake, and many pastry specialties. All of these are produced at the South Broadway Mary Ann bakery, where Allingham installed a new oven, a Federal refrigerator, and holding box for pre-cooling the baked goods at 35° F., a 100-gallon homogenizer and additional tray equipment for moving the baked goods.

As fast as these emerge from the pre-cooler, they are rushed to a South Denver quick-freeze plant, frozen at -30° F. and transferred to a holding room to be distributed to the retail stores. An idea of the total production may be gained from the fact that the Mary Ann Bakery turned out 5,000 cream puffs for sharp freezing during the week of July 6.

WARTIME VOLUME EXCEEDED

Total results so far have been an increase of 25% in sales volume over the two bakery's average six months ago, or slightly more in total than the peak war-time volume accomplished. Profits, however, are slightly smaller, even with an additional markup of about 25% on all frozen baked goods. The reason for this, according to Allingham, is that three profits must be extracted by the bakery, the distributor, and the retailer.

The Mary Ann Bakeries had to lick a lot of problems to build up so successful a frozen goods operation, according to Allingham. First was the presence of moisture in frozen goods which was likely to break down crust, cause soggy cakes, etc. This has been solved through the invention of Protek-Freeze, a rich fat "seal" which is sprayed over the top of the fruit pies, around unbaked crusts, etc., to effectually prevent flavor migration, and moisture.

Because of the high fat content, this "seal" is absorbed into the baked goods when baked in the housewife's oven. It is sprayed over cinnamon rolls, various pastries and other baked goods and has been patented by the Denver baker.

Another serious problem has been packaging. After six months experimentation, Allingham has worked out a specialized carton for each of the baked items. One large yellow

box, with a cellophane "window" on top, is waxed inside and out, and is used for a two-layer whipped cream cake, for small fruit pies, coffee cakes, rolls, etc.

Most expensive package developed so far is a fruit pie box, waxed inside and with a cellophane window, which has a double wall on either side which permits stacking them on top of each other for refrigeration and distribution. These cost five cents apiece. Cream puffs, other rolls, sweet rolls, etc., are packaged in cellophane sacks, which are ordered by 25,000.

It has required an investment between \$2,500 and \$3,000 in packaging to lick all the problems, according to Allingham. A special wooden frame has been constructed in which the two-layer whipped cream cake is placed after baking in large size pans. To compensate for various thicknesses of cake, the frame is filled to the correct level for the package with whipped cream, and then cut into 12 pieces.

Use of the wooden frame means that cakes are always the same height to fit the box. With fruit pies, baked with latticework tops or open, dehydration has been licked by use of the Protek-Freeze seal, which effectually prevents it.

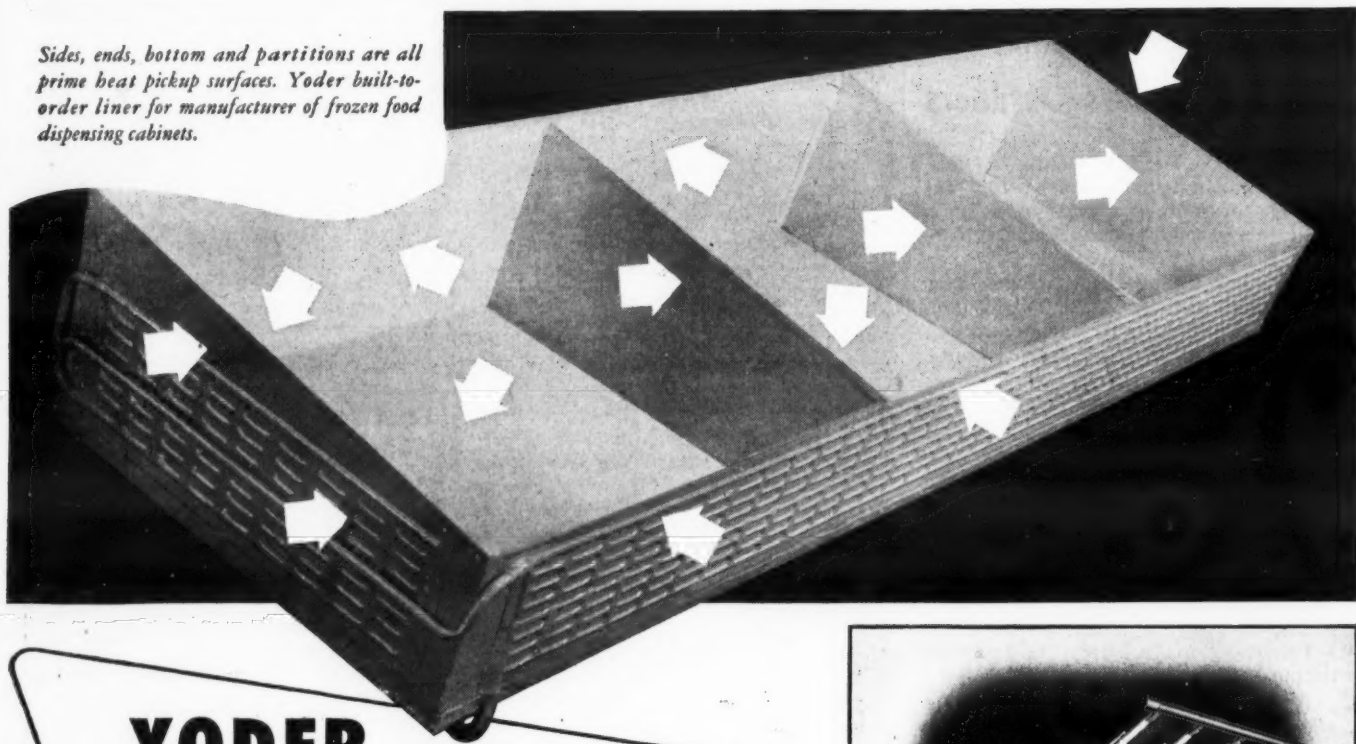
Sweet rolls and cinnamon rolls are baked on a strip of special paper, sprayed with the Protek-Freeze seal, which is 3 1/2 in. wide by 24 in. long. The rolls are baked right on the paper, and torn out into neat strips of four units. Strips are torn into smaller sections for packaging in cellophane and selling.

BAKING HIS ONLY SPECIALTY

At the outset, Allingham tried to install his own sharp freezers and carry out all the operations within the bakery walls. However, he "soon found out that he was a baker, not a refrigeration man," and contracted for space in the King Quick Freeze Plant on South University Blvd. in Denver.

Allingham is soon introducing a quick-frozen chicken pie and a 13-egg angel food cake, because demand has illustrated that there is plenty of room for them. With whipped cream cakes and cream puffs leading the way, the frozen bakery goods, sold separate from the bakeries themselves have already become well established in the Denver market.

Sides, ends, bottom and partitions are all prime heat pickup surfaces. Yoder built-to-order liner for manufacturer of frozen food dispensing cabinets.



YODER FREEZER LINERS

the last word
in space-saving, efficient
heat pickup

Yoder Liners are made to fit any shape and size of cabinet, box, or case—domestic or commercial—serving as a liner, shelf, tray or partition for storage, display and dispensing purposes. It occupies the minimum of space—leaving maximum space available for storage. It is strong, rigid, trouble-free, easily installed. Above all, the revolutionary Yoder channel design—a close network of tiny flat channels insures the highest known heat pickup efficiency, as proved by its K factor of 2.5 for temperatures below 20°F. This means more and quicker refrigeration per square foot of surface, or that a smaller plate surface will meet your requirements at lower cost.

For interested manufacturers with quantity requirements we design and build liners to meet individual requirements at a cost which usually represents a substantial saving in unit cost.

THE YODER CO., Refrigeration Division
5580 Walworth Avenue • Cleveland 2, Ohio



ENGINEERING
YODER
MANUFACTURING

**REFRIGERATION
PLATES**

LINERS • SHELVES • PLATE BANKS

Gloekler

Model 3 ADF
30 Cubic Foot

Model 3 ADI Ice Cube Maker
Also Available



Model 2 FDI
25 Cubic Foot

Model 2 FDF (Blower)
Also Available

With or Without Condensing Units

Gloekler REFRIGERATOR COMPANY
ERIE • PENNSYLVANIA

Refrigeration Problems And Their Solution

By P. B. Reed
For Service and Installation Engineers



Manager, Refrigeration
and Air Conditioning
Division, Perfex Corp.

Which Type of a Service Business? (2)

DEALER SERVICE, A SEPARATE DEPARTMENT

The larger dealers may sometimes find that it is to their interest to maintain their own installation and service facilities. Some dealers prefer keeping the service on the equipment they sell under their direct control. Also, if their installation and service activities are properly departmentalized and managed, a medium-sized or large dealer can probably do his own service at a somewhat lower cost than if he contracted it out to another company who presumably makes a profit.

We say "if" his service and installation is properly managed, the larger dealer can save a little money by having his own Service Department. But if he does operate his own Service Department he must make it a separate department with an allowance to it for its Services, its proper costs charged to it, separate records kept for it, have its own Profit and Loss Budget, and its affairs conducted just about the same as if it were a separate company doing his work on a contract basis.

Unless the Service Department's records are kept separately, with separate accounting, the dealer cannot know what his installation and Service costs are, and he may be losing, in his Service Department, all or even more than his business is making.

On the other hand, his accounting must be accurate and fair. If his Service Department shows a loss he must be sure that the allowance to it for its Services are comparable to what he would have to pay to an outside company. He must make certain that he is not loading charges on the Service Department that it should not be required to carry.

If, for sales policy reasons he makes a special concession to a customer that costs money and the Service Department has to spend money to fulfill that promise, then the Service Department should be paid for that extra service.

For example: The salesman, in order to sell the refrigerator, gives the customer an extra—an automatic defrosting clock, let us say (remember? they did such things once, and probably will be doing them again). The cost of that clock and its installation cost, if any, should not be charged to the Service Department, or if it is, a ledger entry should be made to credit the Service Department with the full cost and charge it against Sales.

AN ERROR IN APPLICATION

Another example: The dealer, his salesman, or his sales engineer, or whoever estimated the job, selects too small an evaporator for a walk-in

cooler installation. As a result the suction pressure is too low, the evaporator temperature too low, (the temperature difference between the evaporator and the food is too great) and the meat dries out excessively and turns dark. Also, due to the reduced suction pressure, the capacity of the condensing unit is so reduced that it is forced to run continuously or almost so, in order to keep the walk-in cold enough.

The Service Department has to correct the job. In the meantime they are probably being blamed. The customer is bitter, he fails to make his payments, the Finance Company is calling on the dealer to make the payment or buy back the contract. He, the Salesman who is threatened with the loss of his commission, and the User are all on the Service Department's neck.

Finally, Service convinces the Boss that the evaporator is too small and that a large one must be put in instead. The larger one is ordered by wire, sent in by express and the exchange made, after which the installation operates quite to the customer's liking. The suction pressure and the evaporator temperature go up, the temperature difference goes down, the meats are kept in their proper condition and the condensing unit runs only about one-half the time. Everything is lovely and everyone is happy, except the Service Department.

In extra service calls before the evaporator was exchanged, in extra material, delivery costs, express which the bookkeeper charged to Service because it was a replacement transaction, and in labor, some of which was overtime at time-and-a-half, the Service Department has already spent \$107 in direct costs more than it was originally allowed to install and service the job and a year's free service is still their liability.

SPECIAL CREDIT TO SERVICE

On such special occasions as that, the Service Department is entitled to a special, additional credit to cover them for extra expense that was not their fault. They should have had an opportunity to review and approve the job before it was installed, but in that dealer's set up, Service was not given this authority.

The Service Manager protested to the dealer "Service is due the extra cost that resulted from all that trouble. You expect me to keep my department out of the red, and I can do it, provided I am not saddled with extra-ordinary expenses like this that I cannot control. You allow me only just barely enough to get by on, less than you would have to pay to have the jobs installed and serviced by an outside company.

"Not only that, but an outside service company would charge you plenty extra on this job. Service should either have a special allowance on this and other extra-ordinary jobs or Service should get enough on

each job that it could build up a little reserve to enable it to absorb such things as this.

"I don't mean that we should be guaranteed that Service would get a special allowance on every job we lose money on. It might be our fault, and that is our lookout. If we fail to test a job well for leaks and

lose the entire charge of gas, we have to bear it, and we should; otherwise we would get careless."

BREAK EVEN OR MAKE MONEY?

Finally, the Dealer was convinced and not only did he credit Service with an extra hundred on that one job but he agreed to a new schedule of allowances to Service, but he said:

"In the past I have purposely kept Installation and Service allowances down to the point where I figured Service could just about break even. I was satisfied if Service stayed out of the black, for I was getting my installation and Service for less than I would have had to pay to an outside service company."

"We will try it the other way. I'll agree to allowances for installation and service about the same as I could contract it for outside.

"But, and be sure to understand this! From now on the Service Department must *make money*. It won't be enough for it to break even. It will have to show at least a 5% *Net Profit* just the same as if it were a separate business."

The Dealer found that it worked out better that way. It kept his Sales Department better in line, for the Service Department was no longer the convenient catch-all for unloading costs that were purely Sales and should be borne by Sales, not Service. He found that there was less tendency for the Salesman to give away extras, for the Sales Department had to stand them instead of dumping them on Service.

Moreover it gave the Service Department a better incentive to show results, a *net profit*, a positive goal instead of just getting by.

✓ CHECK WITH Ranco FIRST

Specialists in Refrigeration	Less Stock to Carry
More Ranco Controls in Use	Greater Customer Satisfaction
✓ Dependability	More Profit For You

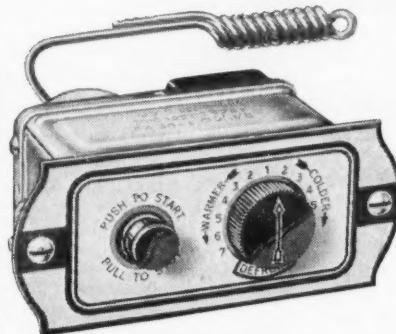
Ask your wholesaler for complete details, or write direct to Ranco Inc. We're ready to serve you.

Ranco Inc.
COLUMBUS 1, OHIO



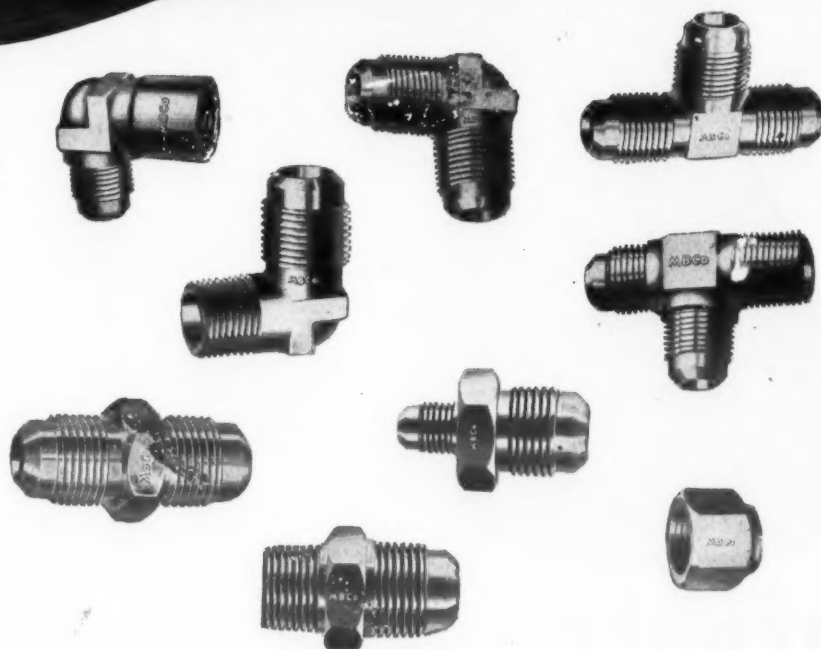
World's Largest Manufacturers of REFRIGERATION CONTROLS

Designed for Dependability



Only perfection will pass the rigid inspections and tests to which every Ranco refrigeration control is subjected before, during and after assembly. Leading refrigeration manufacturers and service men know that Ranco Controls are designed and built to give dependable service. Choose Ranco for dependability of performance—and for your own profit.

MUELLER BRASS CO. Ful-Flo REFRIGERATION FITTINGS



No Restriction in Flow Capacity

Mueller Brass Co. refrigeration fittings conform in every respect to S. A. E. standards with the exception of the bore. THE BORE IS MACHINED TO PERMIT A FULL FLOW EQUAL TO THE INSIDE DIAMETER OF THE TUBING USED, AND CONSEQUENTLY IS LARGER IN INTERNAL AREA THAN S. A. E. FITTINGS.

All fittings are accurately machined and of the

highest quality materials. All flare outlets are finished to the closest desirable tolerances.

Particular attention is given to the accurate machining of flared seats; they must be absolutely flat, smooth and concentric with the bore. All male flare threads are protected by heavy sleeves to prevent damage in shipping or handling.

FORGED Years of experience have conclusively shown that forged brass nuts and fittings are vitally essential in mechanical refrigeration and air conditioning because they require a dense metal structure that can best be obtained through forging.

STREAMLINE
PIPE AND FITTINGS DIVISION
MUELLER BRASS CO.
PORT HURON, MICHIGAN

1/4 H.P. G.E. MOTORS

For IMMEDIATE DELIVERY!

F.O.B. our warehouse. \$21.18
While They Last! EACH

We have in stock several hundred General Electric 1/4 H.P. Capacitor Type motors with built-in overload protector, single-phase, 115 V., 60 cycle, 1725 RPM.

We secured these through a most fortunate purchase and are offering them only to Refrigeration Service Dealers and Contractors because we realize the desperate need of them in the replacement field.

WRITE—WIRE—PHONE
YOUR ORDER TODAY



Want to Sell a Locker Plant?--Successful Contractor Reveals Exactly How He Does It

This is the second of a series of articles describing how Ed Wright and the company he heads—Refrigeration Contractors, Inc. of Youngstown, Ohio—specialize in the selling and construction of locker plants. This instalment continues with a verbatim account of his sales approach to a prospect.

By C. Dale Mericle

"If he should agree to give you the time, the next object that you are going to shoot for is to attempt to get the party away to a place where there will be no interruption and where you can concentrate on the business at hand.

"With his not knowing any more about the proposition than you have told him so far, the chances are that he is not going to readily acquiesce when you ask him to go away from his place of business or maybe into his office or somewhere where you're not going to be disturbed.

Get Him Alone

"It is well to try, however, if the conditions are such that this can be done. However, if he is operating a store alone and quite busy it is obvious there is not much sense in trying to talk business. If it happens to be in a slack time of the day he may be able to spend some time. If he has some other clerk he may be able to go with you to a hotel or maybe he knows of some spot, maybe to his home.

"Let us suppose that this has been accomplished. Then the next step is for you to try to find out how much the prospect to whom you are talking knows about the locker business; whether he is familiar with it. Remember, he may have only heard about it; maybe he has never seen a locker plant in his life; maybe he has no idea of how it operates, what its possibilities are; maybe he thinks it is something that will only work in a farming territory.

"So it is well to ask him if he has ever seen a locker plant, if he knows what its functions are. No matter what his answer is, you can then start off with something like this.

"You know, Mr. Prospect, once in a lifetime a business comes into being that is termed a miracle business. That is just what this frozen food locker plant industry has turned out to be. The story of its growth is almost like a fairy tale out of *Arabian Nights*.

"The wonders that have been accomplished make you think of Aladdin rubbing his lamp. The great

minds in the food business, men who have made a study of foods and agriculture all their lives, say that frozen foods are destined to change the food distribution of our nation.

"Within 10 years we will see a greater change in the merchandising and distribution of foods than we have seen in the past 10 years with the advance of the supermarket. Ever since the beginning of time the preservation of food has been one of man's most troublesome problems.

In the Good Old Days...

"Since the day of the cave man when he used his club to kill his food and tried to dry meat by hanging it in front of a fire, down to the days of spicing, salting, and curing; until the time of Napoleon when canning was developed, the preservation of foods has probably been the most pressing problem of man. Even today in many parts of the country we are faced with famine while other parts of the world are rolling in plenty.

"This certainly is due to improper preservation and distribution. Within the next few years we are going to witness food being flown by large planes, carried by ships and stored in the frozen wastes Nature provided so that the future generation is never going to have to fear a famine. Maybe the Creator in His all wise development of the scheme of things

provided this frozen waste for something.

"You are interested in serving your fellow man as well as making a good living and being able to put something aside to take care of you in your old age. This I think is universally true of almost everyone. The fight for security on the part of all of us is because we feel that in time to come when our working years are past, that we do not want to become a parasite or depend upon the bounty of someone else. We are out to secure the soundness of our investment.

"I think you will agree that rental income from real estate, homes, apartments, etc. is looked upon by banks, insurance companies, and other people to be one of the most sound forms of investment it is possible to make. You know that the first mortgage loan is considered to be one of the soundest investments if it is made on property that is properly valued. The income from rentals is one of the safest forms of investment.

"The rental frozen food storage locker is simply a smart way of renting cold storage space. You know that frozen storage plants have been in existence for a number of years, but it was not until someone conceived the idea of breaking this space up into units and selling the row of lockers that could be rented directly to the consumer thereby making possible a method of preservation that has never before been possible for the consumer to obtain, was the locker plant idea born.

"One of the earliest records we have of the locker plant being utilized in this manner was as far back as 1903. Down through the years this thing has progressed until during the depression when people could not sell their beef and pork, the farmers out in the midwest started storage houses so that they could put away enough food to take care of themselves and family. Even though they had such an abundance they could not sell it, they were told to 'bury little pigs.'

"The locker industry has grown by leaps and bounds. Today there are nearly 9,000 plants in the country. This growth has come since about 1935; up until 1935 there were about 140 locker plants in the country. According to the United States Department of Agriculture, 50,000 plants will be required within the next 10 years.

"The income from the investment

standpoint runs about this time from 25% to 50% net per year. While I know this may sound unbelievable to you, I want you to know that whenever I make a statement, I am prepared to prove it absolutely from unimpeachable sources.

"Let us suppose for the sake of argument that at the present time you take my claims at their face value. I realize this may be asking too much of your time. However, in order to save your time and my time at this particular point, I am going to ask that you believe what I say with the understanding that I will prove my statements a little later on.

"Now, Mr. Prospect, if it were possible for me to show you a business in which you could obtain a return anywhere from 25% to 50% on investment, would you as a businessman be interested in getting into such a deal in connection with your present business? That is, if it worked right along, hand in hand with your business? If it complemented your business?"

Owner or Manager?

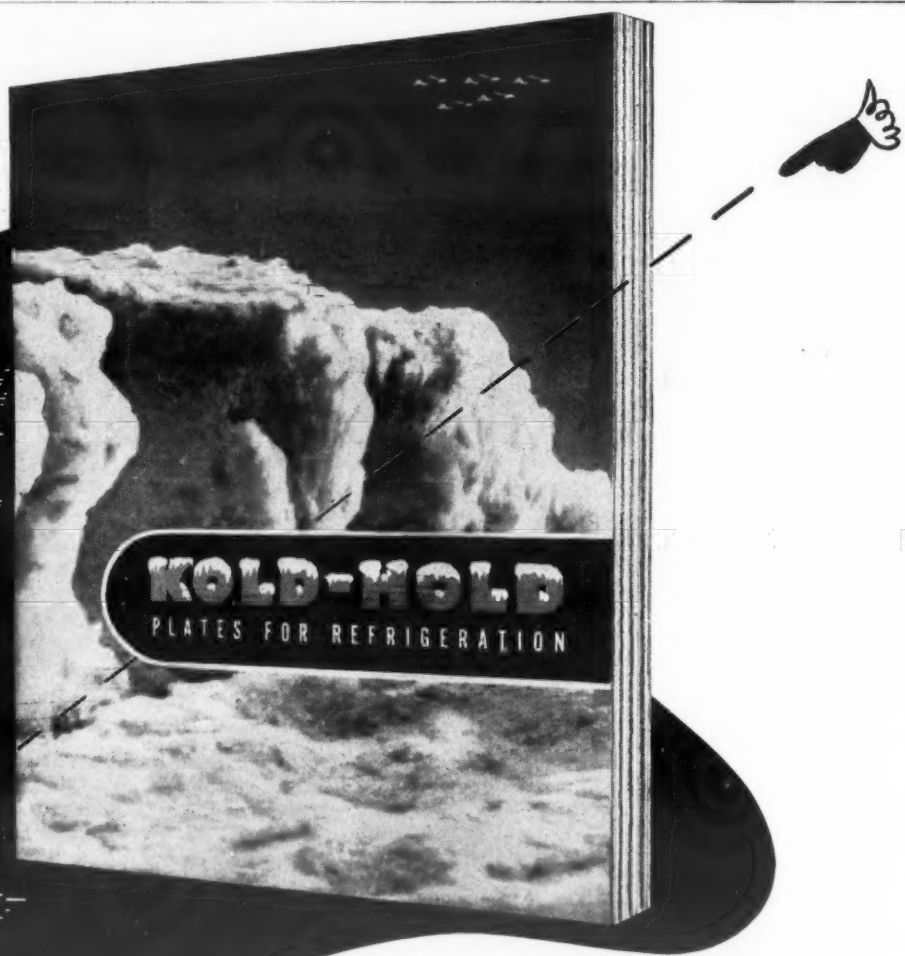
"At this point the prospect is probably going to ask you whether you're interested in selling the plant or installing the plant, or whether we are looking for a manager. No matter what his question is, your reply is practically the same. I would say:

"Well, of course, all of these things depend upon various conditions. As I have told you before, we are owners and operators of several plants. We have built and sold plants to other people. We have also designed several plants for other people. We have a complete organization which is able to take a building lot and hand the owner a key with the going business all set up and operating, personnel hired and trained, a bookkeeping system set up, lockers rented, full store in operation, etc.

"In other words, Mr. Prospect, it is what we call a turn-key job. If you were to say to our organization today, 'Here is \$50,000, I am going to take a trip to Florida. I want to come back here within five to six months and see a going business.' Mister, when you came back, you'd be handed a key, your bank books, and everything all set up. You'd be in business operating at a profit."

"Here you are asking the prospect a question. Almost invariably he is going to say yes. He may at this

(Concluded on next page)



contents

Refrigeration

KNOW HOW

The new KOLD-HOLD Catalog is a book of benefits and savings. It contains refrigeration know-how . . . information relative to the better storage and transportation of perishable products at lower costs. This catalog shows that Kold-Hold Serpentine Plate Type Evaporators have no equal in efficiency and dependability for locker plant space cooling, for shelves and stands in sharp-freezing or as cabinet liners, shelves or dividers. It explains how "Hold-Over" Plate Type Evaporators maintain the temperature of delivery bodies at the uniform level necessary in the successful transportation of fresh meat, ice cream, frozen foods and other perishables.

If you are interested in better storage and transportation of your products, write for this new free book of refrigeration knowledge today.

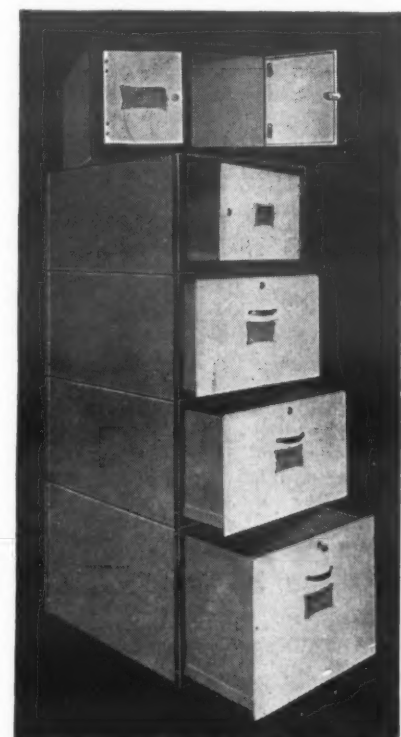
KOLD-HOLD

KOLD-HOLD MANUFACTURING COMPANY, 500 E. Hazel St., LANSING 4, MICH.

Since 1935

HOT NEWS: Immediate Delivery

We've got the steel—we've again stepped up our capacity—SO YOU set the pace and we'll meet it. NOW—One Locker—100 Lockers or a carload—we are ready to deliver any time on time, according to your needs. Order now your requirements of the locker that satisfy—the



MASTER FOOD CONSERVATORS

Wire, Phone, Write

Get the locker that satisfies. Don't be satisfied with anything but the best—the MASTER.

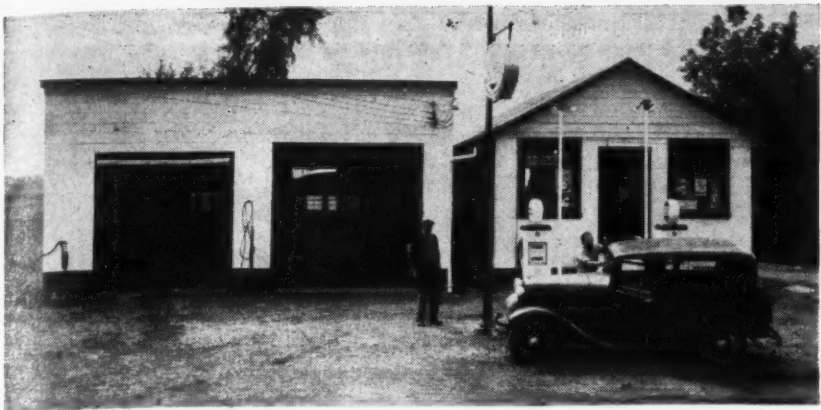
Endorsed by and sold through distributors of refrigeration and insulation.

Master Manufacturing Corp.
121 Main Street
Sioux City 4, Iowa

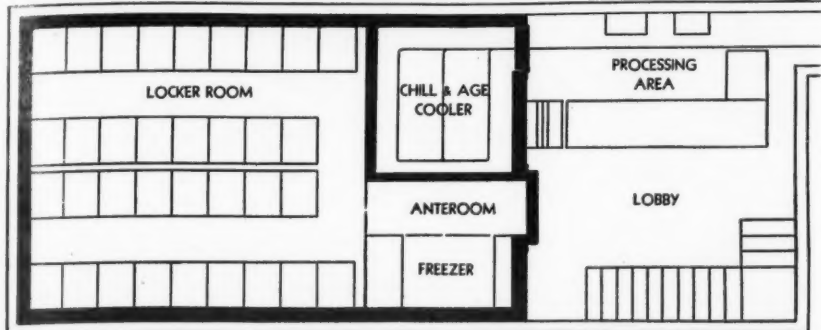
Member of Frozen Food Locker Institute, organized for your protection.

Over 1,000,000 Master Food Conservators in Use

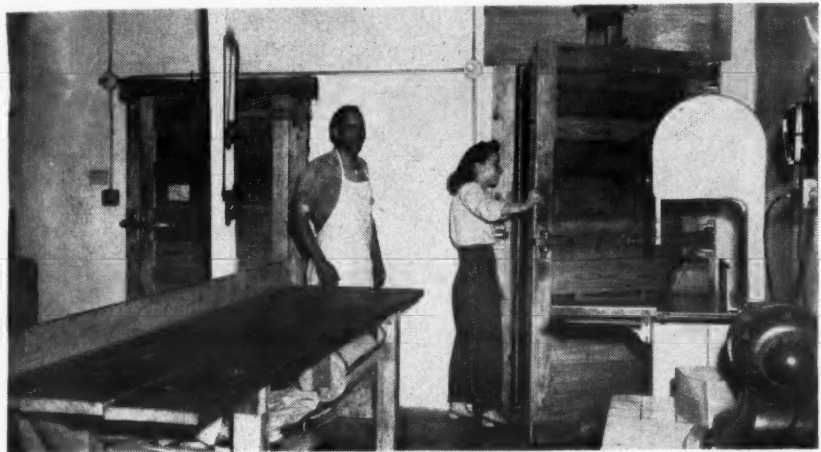
Here's One for Your Prospect List



In the small town of Hartford, Ohio, is this gas station beneath which is a locker plant installed by Ed Wright of Youngstown.



Careful designing permitted this compact arrangement which provides 192 lockers, cooler, freezer, processing space, and lobby in the basement of the gas station.



Frederick Merriman (left), an infantry officer in World War II, now operates this small locker plant in the basement of his service station in Hartford, Ohio.

and would be interested in considering it from an investment standpoint, as I said before, I would certainly be glad to go over this in its various phases. Location, construction, design, operation, management, investment, financing, promotion, and development will be discussed in detail. But in order to do that, we should be where we can go over the material in a leisurely manner and where I'll be able to answer all your questions thoroughly, positively, and intelligently.

"The prospect asks you what it will cost him for this job.

'What Will It Cost Me?'

"Mr. Prospect, I don't know. I could give you some idea. If you were to build a new building it would cost you probably \$60 to \$80 per locker. If it is possible to use a building that would not require much remodeling, cost may run as low as \$40 per locker. However, this is something that should not be discussed at this time, because the amount of money the investment will require is going to depend entirely upon what you want to make from the standpoint of returns, and other things.

"The size of plant this is to be depends largely upon the population of this area. We don't know how many lockers can be rented here at the present time; we don't know anything except that the proposition is brand new, right off the street, you might say. I'm here to start making my study. Well, I'll tell you this, Mr. Prospect, I will know and it won't be very long. Maybe you can tell me. Can you tell me what the population is and the number of families five miles from here?"

"Handling the question this way, you are giving the information to the prospect without telling him anything and putting him back on the fence again whereby he is forced to answer this question in order for you to attempt to give him an answer to his question. Suppose the prospect says, 'Well, I will think about this and talk it over with my banker.' You reply:

"Well, Mr. Prospect, I would like to ask you a question about your bank. If you were a banker and somebody came in to you and said, 'Mister, I am going into a business about which I know nothing. I don't know how much it's going to cost me to go into it; I don't know what I'm going to have to have before I go into it; I don't know anything about it except that I'm going to need \$50,000 or \$20,000.'

"What would you as a banker say? If you were a good banker you would want more information, wouldn't you? Wouldn't you ask for details, plans, specifications, etc.? Mr. Prospect, I have dealt with bankers about these propositions for years. My company talks to bankers every day in the week. We sell this or that proposition. We are explaining how this or that is handled.

"There are many ways of financing this deal, whether it's through your own effort, through the incorporation of another company, co-operative plan whereby your customer helps you finance the plant, there're a dozen ways. Right now you're getting ahead of the story. You're thinking of going into a business about which you know nothing.

"I'm not interested in discussing that kind of a business on that kind of a basis. We don't do business that

way. I'm not interested in having you go to your banker and ask him whether he's going to loan you enough money to go into this business. What I am interested in is determining whether you are the person we feel should be in this business and whether this community is ready for this business.

"Every plant we have put in so far is successful. One thing that our company is very insistent about is that we do not start any people off in this business unless we know they are going to be successful. We're not in a position where we have to worry whether we sell this plant to you today, tomorrow, or somebody else.

Stress Its Soundness

"We know that we are going to continue to sell locker plants in the future the same as we have in the past. We've been in the refrigeration business for the past 25 years. We've made a lot of deals with a lot of people, and we haven't made a lot of deals with a lot of other people, but we're doing business and we expect to continue to be in business. But the only way we can be sure of being in business, the only way we can be sure, is by interesting you in this as a going and sound business fundamentally.

"If I were an attorney brought up to prepare a case in court and went without my briefs prepared, without knowing the facts, you certainly wouldn't think that I was much of an attorney. I certainly would not go in to any banker and discuss this proposition until I had all the details put in front of me."

"Now shut up and let the prospect answer."

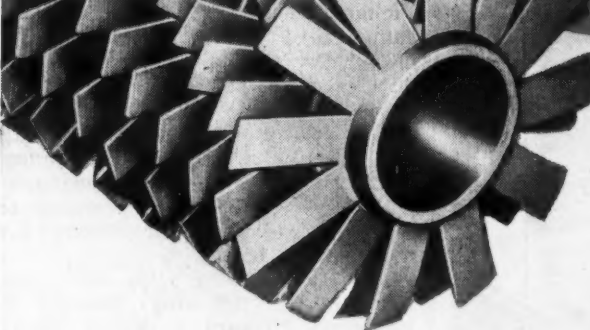
(To Be Continued)

We

"Custom Tailor"

FINNED TUBING

-To Fit Your Needs

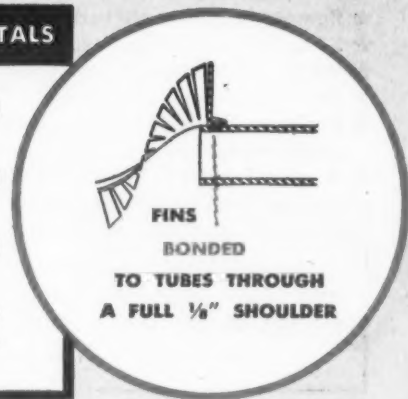


TILGO FIN
Extended Surface
TUBING

If you're designing a heat transfer unit you may find we can solve most any bothersome problem—because we can "tailor" our tubes so very many ways:

YOUR CHOICE OF METALS

- Steel fins can be welded to Steel tubes.
- Monel fins can be welded to Steel tubes.
- Steel fins can be welded to Cupro-nickel.
- Copper fins can be solder bonded to Copper tubes.



YOUR CHOICE OF DIMENSIONS

Fins may be spaced as wide as three rows per inch or as close as eight rows per inch.



Fins may be any desired height starting with 1/4"



Tubes may be as small as 3/8" in diameter. Tubes may be as large as 6" in diameter.



Because of this great manufacturing flexibility (without any extra costs for new dies or special fixtures) we have often been able to make suggestions that have resulted in such typical achievements as—more efficiency with fewer tubes—less space without b. t. u. loss—less costly installations—workable units fitted into awkward areas—more effectiveness than engineers believed possible. It therefore may be interesting to you to ask for our data sheets or, in specific cases, to have us make what suggestions we can. Of course there's no obligation. We'll be delighted to serve you any way at all.

EXTENDED SURFACE

DIVISION OF DAVID E. KENNEDY, INC.
70 Second Avenue • Brooklyn 15, N. Y.

Profits to Contractors Stressed by Wright

(Concluded from preceding page)

point express a doubt as to what has been said as being very true, and in that case you will smile and say:

"Well, I know it sounds like a big order but that is what we have been doing and the records on file will serve as proof."

He'll Be Skeptical

"Possibly at this point he is going to ask how this business can return such profit or else he may say that he doesn't believe that such profit is possible. In that case you say:

"Well, I appreciate how you feel. If some stranger came in to me and made a statement like that I would be inclined to doubt it. But, Mr. Prospect, what could you consider good evidence; what would you need to convince you that what I tell you is true?"

"Then let the prospect answer.

"I have with me surveys made by the United States government, by the Department of Agriculture, by the St. Louis Banks of Co-operative, by the Bankers Association, by various state universities and colleges, by trade magazines, locker operators, and people of that nature. I am prepared to lay before you more facts and figures than you can possibly absorb in the period of a week's time. I can go through these with you and answer every single question

that you might have in reference to this business.

"If you would really be interested in investigating the soundness of this business, seeing what its possibilities are, learning what other people are doing, I am willing to take the time to go into it with you thoroughly, providing this is not merely idle curiosity. If you are not interested in making the investment yourself, you may know of someone who is, or you might be interested in backing some other individual whom you feel might have the ability but does not at the present time have the capital.

"I appreciate the fact that you are busy and that you have many things to look after. This is true with me, too, and I value my time as I value your time, for, after all, time is all we have to sell. We know, for instance, that there are several people in this area who have been considering going into this type of business; that is one reason why we came down here.

"Just who that someone is we are not prepared to say at the present moment. But we certainly feel that we would like to be the concern that will put the plant in this area, whether we build it for some one else, or whether we build it, own, and operate it ourselves.

"If you feel that you would want more information on this business

DESIGNED FOR DURABILITY

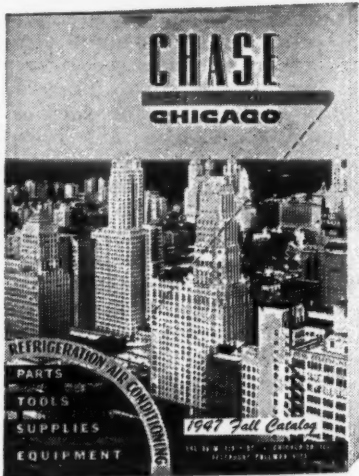
Order Now these popular items from our complete line of Test Proven Equipment. Models to fit any need. Built to give dependable economical performance—heavily insulated and sturdily constructed throughout:

The LA CROSSE COOLER CO.
LA CROSSE WISCONSIN

LATEST
FALL AND WINTER

Catalog READY NOW

Reserved exclusively for the whole-sale trade. Please include proper identification with your request.



CHASE refrigeration supply co. NOT INC.
546 WEST 119TH ST., CHICAGO 28, ILL. — Phone PULman 5125

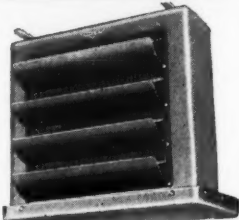
Chicago's Oldest Refrigeration & Air Conditioning Supply House

FASHIONED FOR FUNCTIONING

Even the handsome, engineered good looks of Larkin refrigeration products contribute to their fine performance. The originator of the Cross Fin Coil also offers you matchless quality in Air Conditioning Units—Evaporative Condensers—Instantaneous Water Coolers—Humi-Temp Forced Convection Units—Bare Tube and Zinc Fused Steel Plate Coils—and complete equipment for commercial and industrial refrigeration.



LARKIN COILS 519 MEMORIAL DRIVE • S.E. ATLANTA • GEORGIA



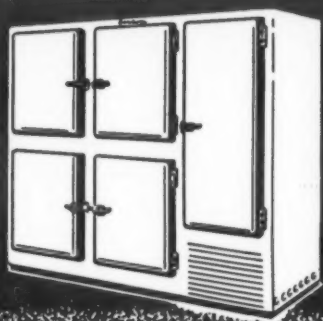
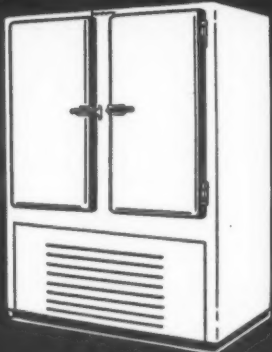
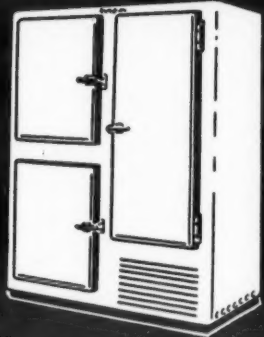
JORDON Delivers when the order calls for a REACH-IN

THE MOST COMPLETE AND
BEST PLANNED LINE IN
AMERICA TODAY!

- ★ Normal Temperatures.
- ★ Tu-Temperatures.
- ★ Ice-Makers ★ With Meat Hooks.
- ★ Remote or Self-contained.
- ★ 23 to 56 cu. ft. Capacity.
- ★ Variety of Models in each size.
- ★ All welded steel.
- ★ Exclusive "Climatic Food Conditioning" and other top choice engineering features.
- ★ And ALL MODELS READY FOR IMMEDIATE DELIVERY

Sell A Complete Matching Line!
MEAT CASES • FROZEN FOOD DISPLAY CASES
BEVERAGE COOLERS • BULK STORAGE FREEZERS
All Nationally Advertised

LET'S GO, MR. DEALER! The big, modern JORDON Plant can take care of your needs, too. Write, wire, phone.



Jordon
AMERICA'S MODERN COMMERCIAL LINE
JORDON REFRIGERATOR CO.
Sales Division
235 N. BROAD STREET, PHILADELPHIA 7, PENNA.
PLANT, PHILA., PA. CABLE: "JORDONREF" LOCust 7-2913

STORE SEPARATES PRODUCE ROOM

Fruits, Vegetables Are Kept Fresh In 65° F. Temperature

EDINBURG, Tex.—Setting up an "air conditioned" fresh fruit and vegetable room in his grocery store has resulted in substantial savings on food spoilage, labor, and advertising, according to R. R. Trevino, manager of the IGA Valley store here.

Mr. Trevino decided to fix up a special cooled room for his fresh produce rather than air condition the whole store because of the tremendous difference between the 65° F. temperatures needed for food preservation and the usual sub-tropical 105° F. prevailing in this lower Rio Grande valley town.

The new room measures 25 by 30 ft. and is partitioned off from the rest of the store by one insulated wall and one wooden wall with a double plate glass window in it. Insulation board has been placed around the two adjacent outside walls and rock wool insulation used in the partition, he explained.

A 3-ton refrigerating unit is employed to maintain a constant 65° F. temperature.

Considered by Mr. Trevino to be one of the most effective merchandising features the store has ever had, the room is credited with bringing about:

1. Increased profit by reducing the daily loss of fruits and vegetables and permitting the handling of items not previously possible,
2. A 75% saving in labor required to maintain the department, and
3. Word of mouth advertising by impressed customers that Mr. Trevino feels is worth the cost of the equipment.

Besides his fresh fruits and vegetables, Mr. Trevino has found it profitable to store in the room merchandise with an oil base, such as peanut butter and salad dressings, that are adversely affected by the intense heat. Shortenings, packaged cheeses, and syrups are also kept there, he said.



This photo, taken inside the IGA Valley Store, looks through double plate glass display windows into the special fruit and vegetable room set up by the manager, R. R. Trevino.



A closer view shows how the two unit coolers are located in proximity to the vegetable and fruit racks so that produce can benefit by the constant 65° F. temperature maintained in the room.

Interchemical Opens Up New England Sales Branch

NEWARK, N. J.—J. G. Morris, president of Finishes Division of Interchemical Corp., has announced establishment of a New England sales branch for the company's industrial finishes with offices located at 10 North Main St., West Hartford, Conn.

This new branch will operate under the direction of Robert K. Hungerford as New England sales manager with five veteran representatives serving customers throughout the northeastern states.

Mr. Hungerford's sales force consists of the following: Stanley S. Raymond, Richard A. Engel, Henry E. Bauer, Richard J. Franz, William H. Robinson.

Tressler, DuBois Resume Food Course at Laval U.

WESTPORT, Conn.—Dr. Donald K. Tressler and Prof. Clarence W. DuBois, of the Donald K. Tressler Associates, Westport, are again conducting a special course of study this fall on the preserving of foods by freezing at the School of Agriculture & Fisheries, of Laval university, at Ste. Anne de la Pocatiere, Province of Quebec.

Of six weeks duration, the course will start the last week in September and will cover all phases of commercial food freezing.

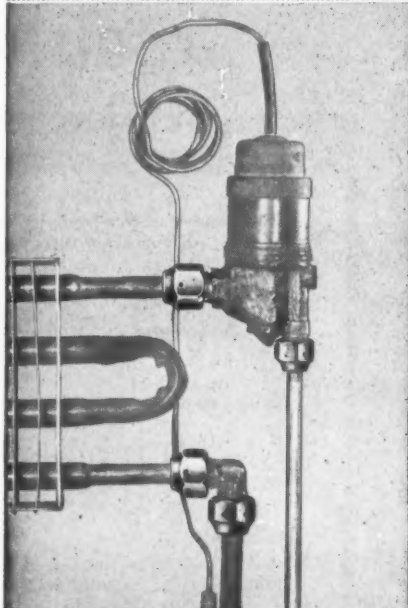
Laval university is one of the few universities on this continent having

a specialized study course in this new method of food preservation. It was instigated by Prof. Louis Berube of the school of agriculture and fisheries back in 1941 for the instructions of all junior and senior students. Prof. Berube planned this course in freezing foods as a biennial feature, but due to the war, the course was interrupted.

Trio Organizes Frigid Cold

LOS ANGELES—Frigid Cold, Inc. has been organized in Los Angeles County, with a capital of \$75,000, to engage in the manufacture and sale of refrigeration, air conditioning, heating, and ventilating. Directors are: Carl W. Faucett, Ellen Hull, and N. I. Rose, all of Los Angeles.

STA-TITE THE REFRIGERATION FLARE NUT which cannot Creep or Work loose



Moisture will work its way along the threads, to fill the space between the fitting and the inside of the flare nut. Confined in this space, the water, in its attempt to freeze during the operating cycle, develops a tremendous pressure—16,400 p.s.i. at 20° F. Something has to give at such high pressures . . . (1) the nut may stretch, (2) the male fitting may collapse, (3) the copper tube flare may extrude . . . any one of which will allow the flare nut to loosen. You know the rest—moisture in the system and/or loss of refrigerant. A condition which has long baffled the refrigeration industry.

NOW—Superior engineers have found a positive cure—the new "STA-TITE" Flare Nut. By simply providing relief openings in otherwise standard flare nuts, the possibility of pressure being created is entirely eliminated . . . the flare nut stays tight!

Thousands of "STA-TITE" Flare Nuts already in service have yet to show a single failure. Moisture trouble, costly and annoying leaks, because of so-called "creeping" flare nuts, have been eliminated completely.

Get "STA-TITE" Flare Nuts from your jobber. Use them on all connections which are subject to frequent or occasional frosting and defrosting. Banish "creeping" and leaks forever!

"STA-TITE" is another Superior contribution to better refrigeration!
U.S. Patent 2,323,099



SUPERIOR VALVE & FITTINGS COMPANY
PITTSBURGH — 26 — PENNSYLVANIA

OFFICES IN PRINCIPAL CITIES • STOCKS: CHICAGO (6) • LOS ANGELES (15) • JOBBERS EVERYWHERE



OFF THE CHEST

'FREON' BLACK MARKET ALLEGATIONS ANSWERED

Automatic Temperature Supplies, Inc.
523 East Main St.
Madison 3, Wis.

Editor:

It is with a great deal of concern that we read your editorial "If the Black Market Shoe Fits, Don't Wear It" and we firmly believe that your reference to wholesalers, so called "black marketing" certain refrigerants calls for retraction. This item appeared in your issue of Sept. 8, 1947.

I assume that the refrigerant referred to is "Freon-12." It is needless for me at the present time to go into the many intricate explanations of the unbalanced supply and demand of this commodity. Too many explanations and excuses have been offered already which we all know about but which most of us fail to understand.

You must admit that we are, as you refer to, "guilty" of splitting up 145 pound cylinders of "Freon" and selling them at quantity bracket which the dealer receives.

If you can offer us a better solution for taking care of our customers demands which often times is ten to fifteen times greater than our supply, we would be more than happy to hear from you. This, we find, is the only way to keep everybody going until the supply balances the demand.

Incidentally, on all other refrigerants which are at the present time plentiful, we always urge dealers to buy full factory filled cylinders and even did the same on "Freon" in pre-war days. The reason for this is quite simple and we will elaborate further on this below.

First of all, I believe, that you should be aware of the fact that the net profit on "Freon" to a jobber has never made handling worth while. It has merely been a convenience item that we are all forced to handle. This will probably be questioned, but we suggest that you consult any refrigeration equipment wholesaler and get his views. Truthfully, "Freon" has always been a headache.

Secondly, you said "the resale profit is much greater in smaller quantities." Is it? Manufacturers advise us that every "empty" cylinder returned to them has from three to twelve pounds of gas in it. When we refill a cylinder, who pays for this? When we refill small cylinders, the labor involved in doing so plus the additional gas lost in filling runs very expensive. Even with transfer equipment we have yet to get 145 pounds of "Freon-12" out of a factory filled cylinder. In addition to this we must often times furnish smaller refrigerant cylinders (brand new), which the dealer will later return to us second hand and want full credit.

We, like many other wholesalers, have often gone out and bought "Freon" from sources which are able to obtain 2,000-pound cylinders. These sources have never bought "Freon" before but are now able to buy in this quantity. Incidentally, wholesalers cannot buy "Freon" in this quantity. At the price that we pay for this gas, we must sell it to the

dealer at the same price that we pay for it. This practice is necessary so that our dealer can complete installations and thereby receive his money and we in turn ours or to remedy emergency breakdowns which often times involve thousands of dollars worth of valuable food or commodities.

Also how many times have wholesalers spent time and money on long distance phone calls, telegrams, etc., to our suppliers in order to get emergency "Freon" releases for jobs that are absolutely inoperative due to the lack of gas? This additional service and expense is gratis and involves no additional expense to our customer.

We don't believe a dealer should object to paying this five to ten cents a pound, depending on the quantity purchased, for our refilling his cylinder when his resale price is still 100% over this cost. Do you?

No, Mr. Taubeneck, I believe you have put the finger on the wrong party when you accused wholesalers of black marketing "Freon." If you think we are putting on an act in order to make additional profit, I would like you to sit at my desk for one day and take my phone calls and thereby learn the headaches that are involved.

You have my permission and it is also my desire to have this letter appear in your next issue.

RAYMOND P. SWEENEY

'YOUNG SELLING IDEAS' CAN LEAD TO SUCCESS

Rava (Sydney) Pty., Ltd.
61 Goulburn St.
Sydney, Australia

Editor:

We were particularly impressed with the provocative article in your "Inside Dope" column of June 22, headed "Grounds of Pessimism."

We feel we have neither grounds for pessimism nor grounds for complaint, and accordingly, take this opportunity of extending an understanding hand across the Pacific to clasp yours.

Being a comparatively young organization, we may be excused for an inordinate display of zeal, which is probably why we have not as yet encountered those diabolical twins—(1) loafing on the job and (2) being afraid to sell.

No sir, there are no such tangible impediments to the distant fields of success and prosperity. How do we know? Well, in less than two years we have become the largest retailer of commercial refrigeration in Australia.

We attribute this meteoric success to the fact that our show consists of young directors, young engineers, and young selling staff. So you see the reason for our impetus is actually young ideas with the motivating slogan "give it a go boys."

And, believe me, we do. We believe, too, that the virile and logical approach to the selling problem today is SELLING. Despite uneven production, a 40-hour week, we have forgotten shortages and queues and bucked into the job to the surprise, alarm, and chagrin of those who ap-

pear disdainful of a job of old-fashioned salesmanship.

The result makes a story of which we are justly proud. And we are still looking ahead and planning ahead despite the embarrassing twist in international trade relations.

We are quite frank in stating that in our opinion, that if the world were broken down to the fundamental components of buyer and seller, we would all achieve a saner and more enduring unity.

This is certainly a weird new era, as you so succinctly say, but it could be a pleasant and secure one. We have proved what one small, well organized, and well directed cell can achieve. It is just a matter of multiplication to make the world as we are—one happy family.

NEVILLE YOUNG,
Manager

FREEZER EDITORIAL PROVIDES STIMULATION

Deepfreeze Division
Motor Products Corp.
North Chicago, Ill.

Editor:

Please accept our congratulations for your splendid editorial "Double Barrelled Opportunity For Specialty Dealers: The Home Freezer," which appeared in the Sept. 15 issue.

Editorials of this type should reach the hands of every appliance dealer. This is the type of stimulation they need to make them realize that we are back to good old specialty selling as we knew it in the prewar days.

May we please have your written permission to reproduce this article in a project we are mailing to 12,000 dealers?

Advertising Manager
R. V. NEWBELL,



REBUILDING OF:

- Compressor Bodies
- Condensers (Air and Water)
- Water Valves
- Controls
- Evaporators
- Float Valves
- Condensing Units

WATER COOLED CONDENSERS
BUILT TO YOUR ORDER IN
ANY SIZE AND CAPACITY

Modern complete shop specializing in rebuilding for the trade in the United States. Many items shipped the same day that your defective part is received.

UNCONDITIONALLY GUARANTEED

Fully illustrated catalog packed full with valuable information and prices sent upon request on your company letterhead.

REFRIGERATION MAINTENANCE CORPORATION
321 EAST GRAND AVENUE • CHICAGO 11, ILLINOIS

SALES ENGINEER WANTED

We require a man with the following qualifications:

Thorough knowledge commercial refrigeration and coils in particular.

Intimate contact with jobbers and manufacturers—East.

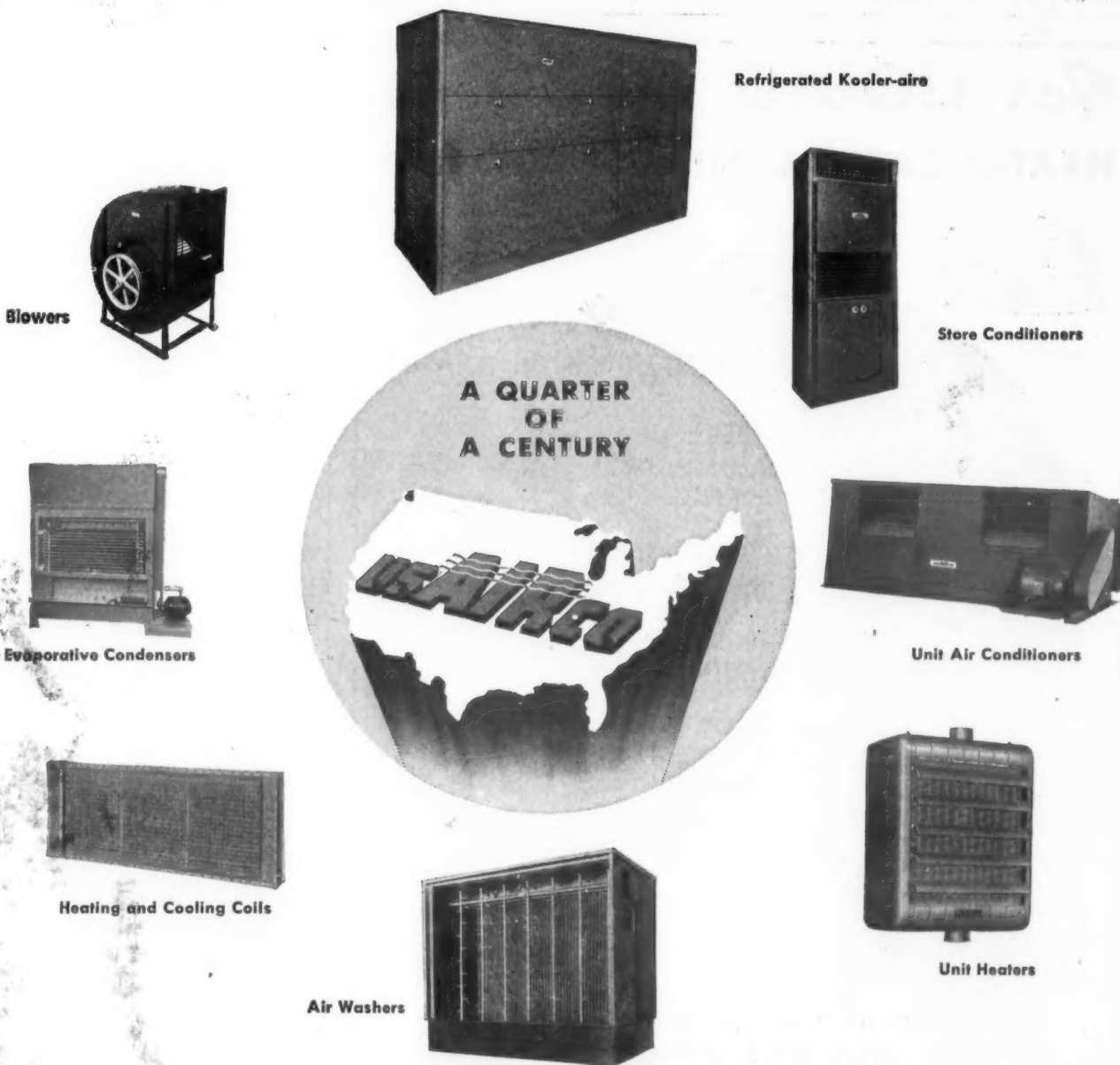
30-45 years old.

If your past record will stand a rigid investigation, an unusually attractive position awaits you. Remuneration in excess of \$9,000 yearly.

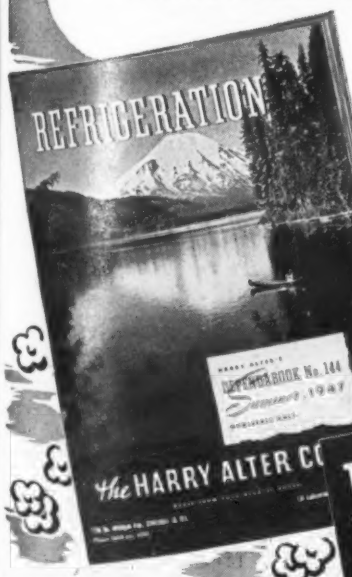
Box 2497, Air Conditioning & Refrigeration News

A QUARTER OF A CENTURY OF A CENTURY Supplying GOOD EQUIPMENT

Once you've specified usAIRco air conditioning equipment, and experienced usAIRco's willingness to serve you as you'd like to be, you'll gain an appreciation of the factors of its large and steady growth. Smart designing, inspired engineering, sound manufacture are valuable assets to everyone specifying, installing, and using air conditioning. usAIRco offers you all this—plus cooperative engineering counsel in all phases of air conditioning. Depend on a name that has been growing and building for a quarter of a century.



The NEW Harry Alter Summer DEPENDABOOK No. 144 is OUT!



It's the Refrigeration Parts Catalog you can't afford to be without. Send for your copy TODAY, on YOUR letterhead, please.

THE HARRY ALTER CO., INC.
1728 S. MICHIGAN AVENUE, CHICAGO 16, ILL.
134 LAFAYETTE STREET, NEW YORK 13, N. Y.

Factory representatives in principal distribution centers
UNITED STATES AIR CONDITIONING CORPORATION
COMO AVE. S. E. AT 33RD
MINNEAPOLIS 14, MINNESOTA

Rutland Dealer Revamps Flood-Hit Frigidaire Appliances--Free

Estimate Labor Costs Only \$300

RUTLAND, Vt.—Cartmell's Sales & Service, Frigidaire dealer here, has provided an example of "good community relations" by providing its home appliance customers with one of the most unusual forms of disaster relief on record.

When waters of a flash-flood subsided, after having inundated a large section of the city of Rutland, the dealership was ready with a free "clean-up and inspection" service for customers, whose Frigidaire home appliances had been damaged.

Previous arrangements had been made with the dealership's nearby Middlebury office for additional crews of servicemen and extra trucks. Refrigerators and other home appliances, which were out of service and damaged by the flood water, were picked up and trucked to Middlebury. There, they were pressure-cleaned, dried, repaired, and put into running condition before being returned to Frigidaire users in Rutland.

The program was boosted along by a half-page advertisement, addressed to Frigidaire household appliance users in the flooded area, in the *Rutland Daily Herald*. The advertisement read:

"As a service to all Frigidaire household appliance users we have arranged with our Middlebury office to send to Rutland, crews of refrigeration servicemen and trucks to pick up your Frigidaire appliances, which will be taken to Middlebury, pressure-cleaned, dried, inspected, and put in running condition and returned to you on a 'no charge basis.' This will not include cost of replacement parts needed, unless such parts and installation are authorized by you. We are happy to do this in appreciation of your patronage and friendly cooperation."

The dealership reported that there had been 34 appliances cleaned and serviced for homes in the flood zone within a few weeks and there are still many more to be done.

Cartmell's estimated labor costs thus far are only about \$300; customer goodwill—immeasurable.

Converted Supply Carriers Get Carrier Conditioning

NEW YORK CITY—Four former supply carriers built in 1944 for the U. S. Maritime Commission have been converted by the Bethlehem Steel Co. to combination cargo-passenger ships for the Chilean line.

A feature of the conversion has been the installation of cargo refrigeration equipment provided by Carrier Corp.

The vessels have been renamed the *Copiapo*, *Aconcagua*, *Maipo*, and *Imperial*. They will serve on the New York to Valparaiso run, stopping en route at Cristobel, Canal Zone; Buenaventura, Colombia; Guayaquil, Ecuador; Callao, Peru; Arica, Antofagasta, Valparaiso and San Antonio, Chile.

The conversion work consisted of removing all defense features; providing staterooms, dining room, lounge and other facilities for 12 passengers; rearranging quarters for officers and crews; and revising of the cargo area to provide refrigerated spaces, a mail room, special stowage for acid cargoes, dry stores, and baggage room.

The cargo refrigeration machinery spaces contain five Carrier 7G6 compressors, condensers, and receivers for the refrigeration installation.

The system is designed for direct expansion "Freon-12" refrigerant. A Carrier 15Q marine type cold diffuser is located in the fan room of each of the four refrigerated cargo spaces. An extensive duct distribution system is connected to the cold diffuser. The duct work in the cargo refrigerated space has openings to the deck and to the overhead, one of which is closed and the other open in operation. This is necessary since, in carrying bananas, the cool air will be admitted at the deck.

Each fan room has an outside air make-up supply which is used when carrying fruits such as bananas in order to prevent the carbon dioxide content from rising beyond a predetermined value.

The Carrier refrigeration installation is flexible enough to protect bananas at approximately 54° F. and frozen foods, meats, etc., at 0° F. It is so designed that one or all refrigerated spaces may be operated at individual temperatures. A complete standby compressor unit, with its associated equipment, is provided.

2-Month Campaign Sells 18,709 Air Circulators

NEW YORK CITY—As proof that "attractively priced appliances can move in great volume," E. F. Jeffe, vice president in charge of sales for Consolidated Edison Co. of New York, Inc., reported that a total of 18,709 Rex Cole air circulators had been sold during a special campaign from July 1 to Sept. 15.

A horizontal fan enclosed in a hashock-like frame, the air circulator retailed at \$45.95 before the campaign opened. During the drive, which was backed by advertising and displays, it retailed at \$33.50. At the close of the campaign the appliance was returned to its previous price, Jeffe said.

Jeffe pointed out that the 18,709 circulators sold during the drive by the Consolidated Edison system, which includes Westchester Lighting Co. and cooperating appliance dealers, compared with "only 300 circulators sold in the territory in the previous 12 months."

"Final results," he said, "were considerably beyond those estimated at the beginning of the campaign. The manufacturer-distributor and the cooperating appliance dealers benefitted through introduction of this appliance in the metropolitan area in a volume which otherwise could not have been accomplished in a comparable period of time."

"The stimulated acceptance of the air circulator by customers resulting from this campaign undoubtedly will develop a market in other territory and open up new fields for such appliance sales by dealers."

Bendix Distributors To Meet Jan. 18-19

SOUTH BEND, Ind.—Distributors for Bendix Home Appliances, Inc., have been notified by W. F. Linville, general sales manager, that the 1948 distributor convention will be held in the Edgewater Beach hotel, Chicago, Jan. 18 and 19, during the January markets.

Presence of distributor presidents, general managers, and Bendix sales managers is requested particularly, but other distributor personnel may also attend.

A general session is scheduled for the first day, with individual conferences slated for the second.

Detrola Sales, Profits Rise, 9-Month Report Says

DETROIT—Net profit of International Detrola Corp. and subsidiaries for the nine months ended July 31 was \$1,139,907.88 after tax provision, compared to \$950,700.91 in the similar 1945-6 fiscal period, reports President C. Russell Feldmann. Sales were \$53,028,515.81 against \$25,790,435.91 in the 1945-46 quarters.

Included in the report for the first time are operations of the Universal Cooler Co. of Canada, Ltd., which on Feb. 3, 1947 became a wholly-owned subsidiary. Detrola had owned controlling interest since 1945.

1948 Sears Deluxe Electric Range Introduced



Sears, Roebuck & Co.'s new master deluxe Kenmore range, now in the retail outlets, features a combination deep-well cooker and surface burner, blower-type oven warmer, and an individual neon replica light for each burner.

New Sears Models Priced From \$120 to \$270

FTC Petitioned To Probe N. Y. Appliance Industry

CHICAGO—The 1948 line of Kenmore electric ranges was introduced recently by Sears, Roebuck & Co.

The line consists of six models ranging in width from 20 to 41 in. and in retail price (Chicago area) from \$120 to \$270.

All ranges are being manufactured by the Newark-Stove Co. of Newark, Ohio. Their design was a product of collaboration between the industrial design firm of Sundberg-Ferar of Detroit and Sears designers.

New general features include a deep well cooker that can be lifted to serve as a fourth surface burner, a thermostatically controlled blower in the warming oven that automatically distributes heat uniformly, and an individual neon replica light for each burner, located on the back panel to indicate when each top unit is on.

Also featured are triangular shaped infrared units with flat tops for maximum contact with the utensil bottom. These units operate at seven cooking speeds.

The broiler grill has a "track" arrangement that permits food to be raised or lowered to seven different adjustment points. The oven also has a telescopic rack that will extend beyond the oven door for placing and removing dishes.

The oven door is equipped with a heat-proof, double panel glass door which gives full vision of the oven interior without opening the door. This can be removed for cleaning.

A Robotimer electric clock starts and shuts off the oven automatically at a set time. It also controls convenient outlets and the Top-or-Well unit in the master deluxe model.

A fluorescent light illuminates the back control panel and the surface of the range.

The various models with their width and Chicago retail price are:

Rangette	20 in.	\$120
Leader	36 in.	\$155
Standard	40 in.	\$175
Deluxe United Top	41 in.	\$230
Deluxe Twin Top	41 in.	\$230
Master Deluxe	41 in.	\$270

NEW YORK CITY—Petitions filed with the Federal Trade Commission by electrical appliance associations from Brooklyn, Bronx, and Queens have requested the federal agency to investigate the association's charge that four retail buying and service organizations have combined and organized for the purpose of controlling the electrical appliance industry in the metropolitan area of New York City.

The four firms against which the charges were made are Affiliated Retailers, Inc.; New York Council on Retail Trade Diversion, Inc.; American Mercantile Co., Inc.; and Retail Dry Goods Association.

The complaint to the FTC is said to be based on the charge that the above named organizations bring pressure to have private brand appliances manufactured, this in turn proving inimical to the interests of the independent appliance dealer since it drains off material and production facilities for the manufacture of the name brand products that would normally go to the independent dealer.

Eastern Appliance Annex Sells Out Opening Day

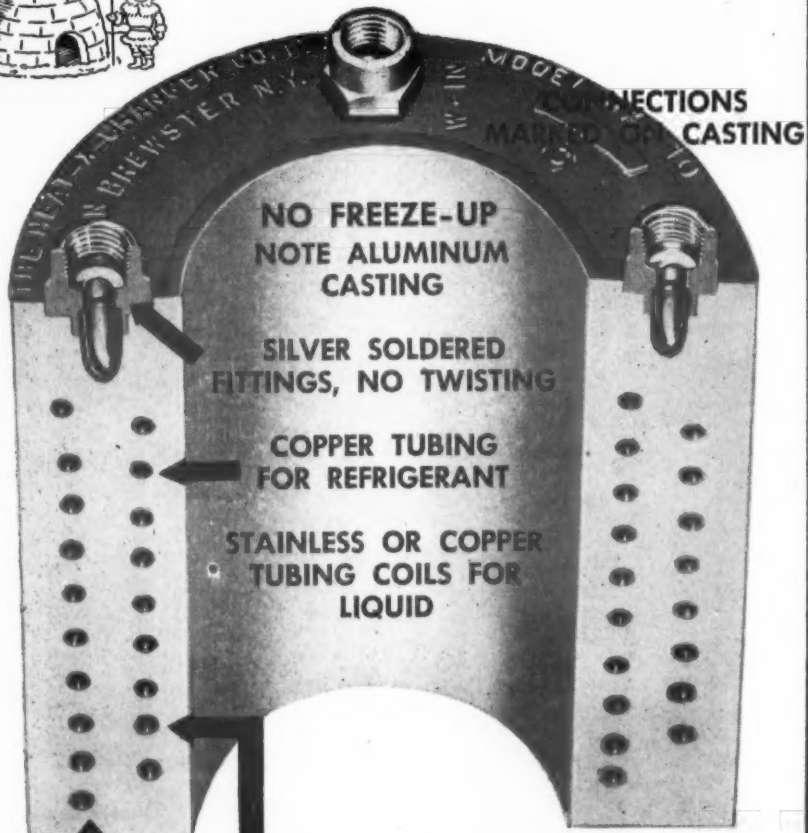
ATLANTIC CITY, N. J.—When opening day ended at the M. E. Blatt Co.'s new appliance annex, located right next to the main department store on South Carolina St. here, all current stock—several hundred units—had been sold, Max Abrams, buyer, has declared.

The new annex, covering 2,800 sq. ft. of floor space, had been formerly used as a storeroom.

In remodeling, two sides of the annex were converted into "open shop" type display windows that enable passersby to see the entire floor display, he added.

Customers appeared particularly interested in an all-electric kitchen and laundry equipped with General Electric appliances, he stated.

For LIQUID COOLING HEAT-X CAST ALUMINUM COOLERS



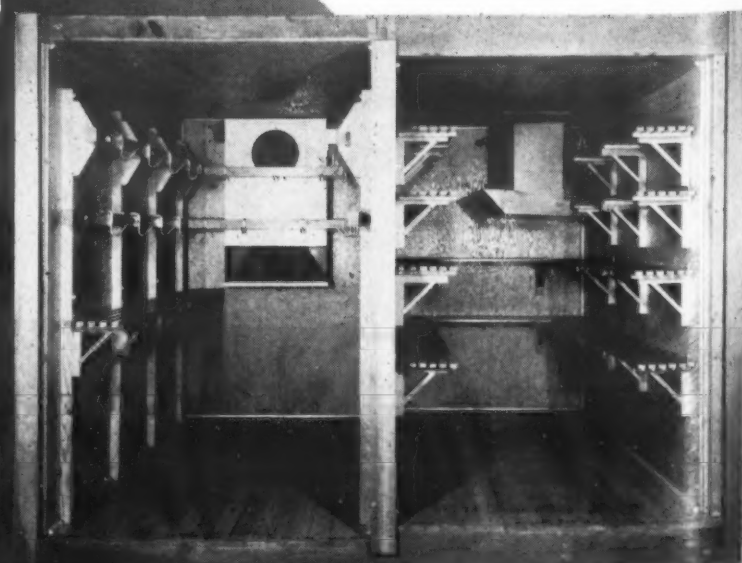
LIQUID AND REFRIGERANT CANNOT LEAK INTO EACH OTHER

HEAT-X Cast Aluminum Coolers are simple, sanitary and compact. They require but a small refrigerant charge. All connections are plugged for shipping. Sanitary operation assured with all tubing embedded in aluminum. For Water Coolers, Soda Coolers, Beer Coolers, Cooler Carbonators and Heat Exchangers write:

THE HEAT-X-CHANGER CO., INC.
415 Lexington Avenue, New York 17, N.Y. Brewster, N.Y.

COLD AND COLDER

Alert to the need for greater storage capacity for frozen foods, a combination cooler has been added to the SHERER line of display and storage refrigerators... and there's a section for 38°F and one for 0°F. This refrigerator will find favor with food markets, hotels, restaurants, institutions, and clubs. Also available to SHERER distributors is an all-freezer cooler in a variety of sizes.



REFRIGERATED MERCHANDISERS

SHERER-GILLETT CO.
Marshall, Michigan

Some of the New Products and 'New Ideas' Demonstrated At the Locker Plant Show



These first pictures from the National Frozen Food Locker Show depict some of the exhibits that were drawing special attention. In the above, E. L. Hinchliff of the Amana Society stands ready to demonstrate the features of the recently redesigned small Amana home freezer, which features easy accessibility of the stored foodstuffs.



This 15.2-cu. ft. Coolerator low temperature cabinet can be sold either as a home and farm freezer, or can be made into an effective frozen food display and merchandising cabinet by the ingenious use of labeling and pricing on the raised-up cover.



Manufacturers and distributors of counter-type ice cream freezers are aiming at refrigerated locker storage plants as logical markets for their equipment, pointing out that such plants are often large-scale retailers of frozen foods, and that ice cream is probably the "original frozen food." In this picture Oliver M. Kirts of Kirts Refrigeration Electric Co., Kansas City, Kan., describes how a Taylor counter-type ice cream freezer would fit into the locker plant operated by Mr. and Mrs. Joe Nemecek of Jordan Frozen Food Lockers, East Jordan, Mich.

Engineering Booklet Provides Fundamental Data on Pipe and Fin Coil Calculations

CHICAGO—An engineering data book providing the fundamentals of pipe and fin coil calculation has been published by the Rempe Co. here.

The book has been compiled by engineers especially for draftsmen and designers to provide complete and easily accessible information necessary for laying out pipe and fin coils for heating and cooling applications.

It treats heat transfer "K" factors for all ranges of heating and cooling from -60° to 350° F.; gives recommended air velocities and fin spacing for fin coils; shows in detail how to calculate and design pipe and fin

coils for all generally encountered heating and cooling loads.

Besides Reference and Design sections for both pipe and fin coils, the book treats such subjects as inspecting, testing, and finishing of coils, calculation of heating and cooling coils, methods of computing fin coil surfaces, application of coils to particular types of heating and cooling units, and properties of saturated steam. The book is illustrated and has many pages of tables. It contains 34 pages.

The Rempe Engineering Data Book is offered for sale by the company at \$1.50.

Locker Plant Builders Seeking New Policies To Expand Number of Plants--

(Concluded from Page 1, Column 5)

panies, and other financial institutions to make loans for locker plants while construction costs are at their present high levels.

Also, the general practice of paying off a locker plant in three years was felt by F.F.L.I. members as being too short a time.

PRESENT RENTALS TOO LOW

Mr. Farquhar likewise felt that present locker rentals are too low, and he urged operators to raise their charges so that more new plants could be built. Prospective locker operators, he said, hesitated to go into the business today because the rentals and processing charges are not high enough for adequate returns.

Culminating three years of preparation, F.F.L.I. also announced that it will go to press within 60 days on its new book of standards covering design and construction of locker plants.

Entitled *Your Locker Plant*, the 350-page book is intended to serve as a guide to contractors, operators, and prospective operators for the construction of plants. The book will be available through the Institute, trade publications, and the usual sources.

Meetings of the National Frozen Food Locker Association got underway Monday evening at the Music Hall of the Auditorium. Former presidents of the group and Albert Guggedahl, secretary, joined with

Frank Miles, editorial director of the *Locker Operator*, in dedicating this session to the late Wayne Carver, editor of that magazine.

The association also instituted at this session the "Wayne Carver Memorial Award," to be presented annually to the retiring president; E. G. Spencer, receiving a watch this year.

Meetings of this group also included sessions on Tuesday, Wednesday, and Thursday mornings, and afternoon "clinics" on various phases of locker plant operation and construction.

On Wednesday night, the Amana Society sponsored a two-hour show, the "Brush Creek Follies," in the Music Hall for all members and guests attending the conventions.

SHORTAGES STILL PROBLEM

A wide variety of displays marked the exhibition in the arena, but few new products were in evidence. Continued shortages of materials, manufacturers said, keep them concentrating on deliveries rather than new products.

Five new directors were elected by the Institute group. Representing contractors are John Bonitz and R. W. Hayes; suppliers, James B. Smith and Del Card; manufacturers, Bryce Vollmar.

Other directors include L. O. Warner, George Foerstner, Ray Farquhar, Roger Sprague, and J. A. Smith.

'Lauderall' Campaign Has Prizes for All In Distribution Setup

DETROIT—F. L. Jacobs Co., manufacturer of the "Lauderall" automatic washer, will open Oct. 1 a nation-wide prize award campaign for dealers, retail salesmen, and wholesale salesmen, it is announced by Edward A. Ash, director of the company's appliance division.

The campaign, which ends Dec. 31, offers the following classes of awards:

1. "Family Treasure Hunt" for retail salesmen. Winners will have a choice of prizes from a catalog listing prizes ranging in value from \$6 to \$600.

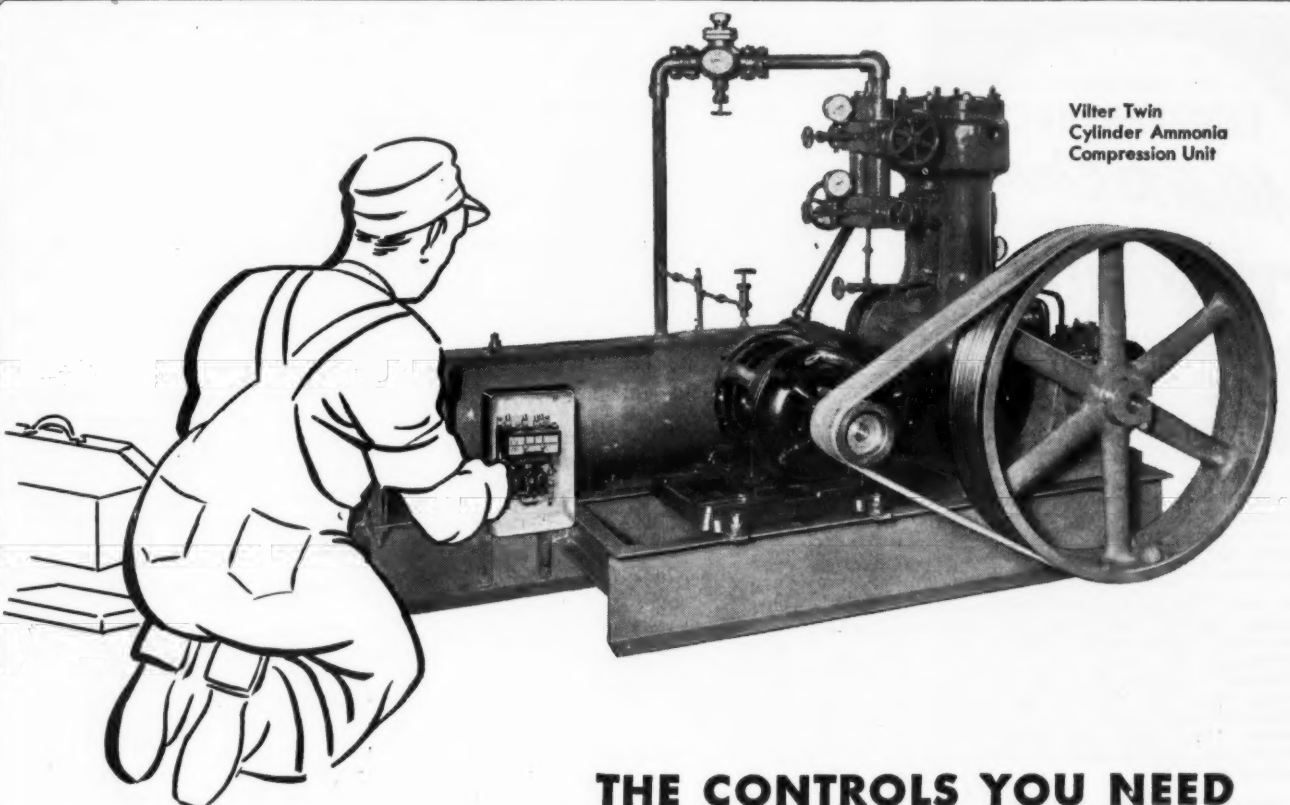
2. An all-expense vacation trip for dealers.

3. Four 1948 automobiles as the grand prizes for wholesale salesmen.

Each salesman will get points worth \$6 in merchandise for each machine sold during the prize campaign period.

To qualify for the all-expense vacation trip, dealers must purchase a minimum of 50 units during the period. If the dealer buys 100 machines during the campaign period, he is entitled to two trips. Each trip will be worth \$200 plus \$50 for pocket money.

For the wholesale men, distributors have been divided into four groups, determined by population size. The wholesale man with the highest average sales against quota for the three-month period in each distributor group will win one of the four automobiles.



Vilter Twin Cylinder Ammonia Compression Unit

THE CONTROLS YOU NEED TO MAKE IT RUN—You'll find in the Allen-Bradley line

RELAYS AND CONTACTORS

from 1 to 8 poles—with or without enclosures—for alternating or direct current service. Silver alloy contacts need no maintenance.

MANUAL A-C MOTOR STARTERS

for across-the-line starting of squirrel cage motors. Accurate, dependable overload breakers. Push button operated. Enclosures for every service.

AUTOMATIC A-C MOTOR STARTERS

for across-the-line starting of a-c motors. Thermal overload relays. No contact maintenance. Good for millions of trouble-free operations.

COMBINATION A-C MOTOR STARTERS

save space, save wiring, and reduce installation costs. Disconnect unit and automatic starter in one cabinet. Safe—cannot be opened unless disconnect lever is in "off" position.



TEMPERATURE SWITCHES

for air-conditioning and refrigeration. Internally or externally adjustable. Reliable snap action switch with silver alloy contacts.

PRESSURE SWITCHES

for air, gas, steam, and liquids. Accurate and easily adjustable. Snap action switch. Available in various ranges and enclosures.

THREE-WAY SELECTOR SWITCHES

for hand-off-automatic control of air-conditioning or refrigeration. Standard or heavy duty. Flush or surface mounting. Also watertight.

VELVET SMOOTH STARTERS

graphite compression resistance starters for jerkless acceleration of flywheel loads. Manual or automatic. Ideal for starting heavy refrigeration compressors.

Allen-Bradley Co., 1313 So. First St., Milwaukee 4, Wis.



ALLEN-BRADLEY

SOLENOID MOTOR CONTROL

QUALITY

The KEY to AIR CONDITIONING

One of a series from

by James J. LaSalvia

Editor's Note: Continuing his discussion of refrigerated storage systems as applied to air conditioning, the author of this series begins in this instalment a detailed discussion of how to calculate and design a system for air conditioning a theater.

Refrigeration (Con't)

In order to illustrate this storage principle, let us take a neighborhood theater that operates only in the evenings during the first part of the week and from 1 p.m. to 11 p.m. on Saturdays and Sundays.

It is intended to keep the inside at a temperature of 80° F. and 50% r.h. when the outside conditions are 95° F. dry bulb and 75° F. wet bulb.

The total seating capacity of the theater is 1,100 people, at any one time.

We are to use 5 c.f.m. per person for ventilation requirements.

It is necessary to calculate the heat gain in the same manner as a conventional type system.

The heat gain is as follows:

Sensible Heat

1. Transmission losses through walls

and roof = 50,400 B.t.u./hr.

2. People 1,100 x 220 = .. 242,000 B.t.u./hr.

3. Lights = 10,200 B.t.u./hr.

Total internal

sensible heat = 302,600 B.t.u./hr.

Air requirements, assuming in this case to enter at 14° below inside temperature, or 80° - 14° = 66°.

302,600 B.t.u./hr.

1.08 x 14° = 20,000 c.f.m.

20,000

1,100 = 18 c.f.m. per person.

On theater jobs 18 c.f.m. per person should be the lowest amount of air that should be supplied. In first-class theaters this should be raised to somewhat between 20 and 25 c.f.m. per person. This is accomplished, of course, by allowing a smaller differential between inside temperature and entering air.

4. Duct and fan losses—

10% x 302,600 = 30,260 B.t.u./hr.

5. Ventilation—

1,100 x 5.0 x 60 x .018 x 15° = 89,100 B.t.u./hr.

Total sensible

heat load = ... 421,960 B.t.u./hr.

Latent Heat.

6. People—

1,100 x 180 = .. 198,000 B.t.u./hr.

7. Ventilation—

5,500 x 60 x (7.1 - 5.8) x .154 = .. 66,100 B.t.u./hr.

Total latent

heat load = ... 264,100 B.t.u./hr.

Total sensible

heat 421,960

Total latent

heat 264,100

Total heat

gain = 686,060 B.t.u./hr.

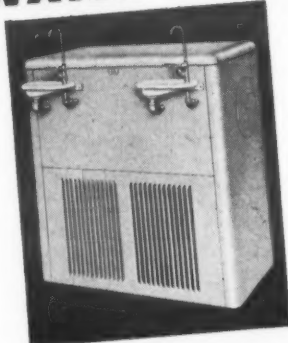
686,060

= 57.2 tons of refrigeration.

12,000

Therefore, the total tonnage for the maximum operation period for any one hour with 100% mechanical refrigeration will be 57.2 tons, using

CABINET DRINKING WATER COOLERS



Glass filler or bubbler coolers are available with capacities up to 25 gallons per hour. Cabinet of heavy steel welded construction with white baked enamel surface. Also available now—normal and high suction pressure water coolers for commercial use.

Write for latest data.

DAY & NIGHT REFRIGERATION DIVISION
One of the Dresser Industries
MONROVIA, CALIFORNIA
SOLD THROUGH REFRIGERATION WHOLESALESMEN AND DEALERS

Fig. 2—How a Refrigerated Storage System Can Be Designed for Theater

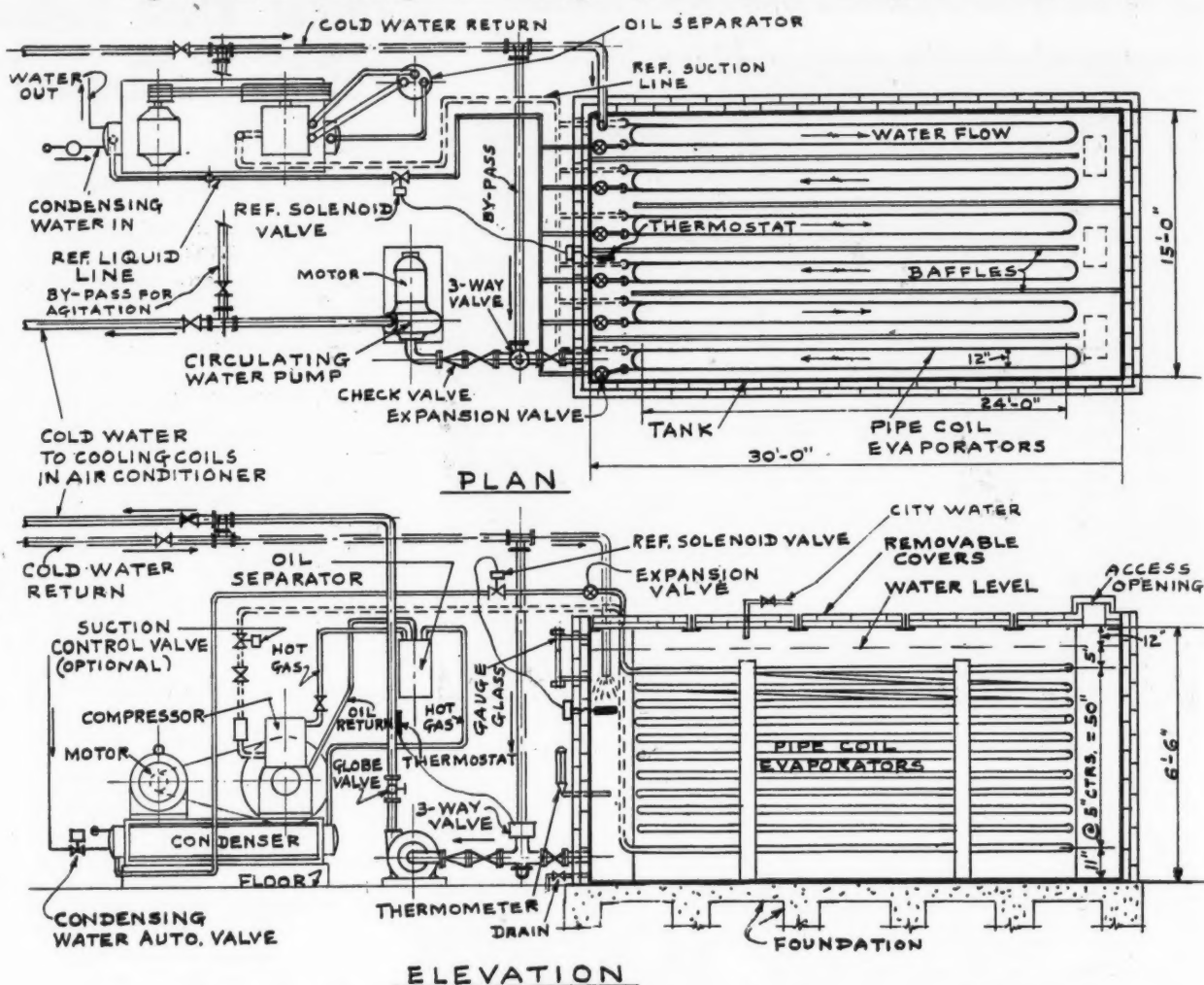


Fig. 2—This is one design of a refrigerated storage system for a theater air conditioning system.

20,000 c.f.m. This would require a compressor with a 75-hp. motor.

For a storage system 57.2 tons or less can be had according to the demand. The 20,000 c.f.m. is used throughout the operating period.

In a storage system the total refrigeration load must be estimated in accordance with the above total heat gain for any one maximum hour, from 1 p.m. to 11 p.m., and the total 10-hour load must be used.

Each hour must be taken as a ratio to the maximum hour and totaled.

Table 1 gives the percentage of any one hour to the maximum hour in accordance with many theater houses of which the author has made an extensive study, and will meet the condition of most theaters.

This heat gain is for a 10-hour operation, but it is equivalent to approximately a 7-hour continuous maximum load.

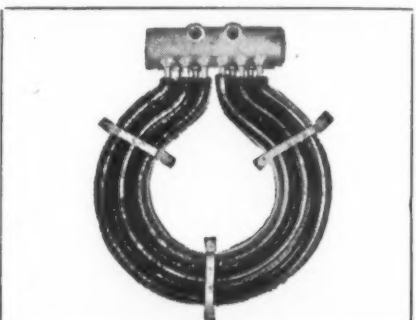
COMPRESSOR SIZE

The storage system consists of cooling evaporators made of steel pipe submerged in a tank with refrigerant in the evaporators and water around the evaporators. The water is to be cooled to 35° F. Under this condition some ice is formed to the thickness of 1/2 in. around the evaporators.

In order to cool water as low as 35° F., it requires a selection of compressor to operate as low as 19° F. suction temperature.

As the 35° water is used at the air conditioner, the temperature of the water in the tank will rise, so that at the end of the day's operation, when the air handling system is shut down, the temperature of the water in the tank will be anywhere from

ROME-CONDENSER ★ Jointless Type ★



Rome Water Cooled Condenser Coils insure trouble-free condensing equipment. Used by leading compressor manufacturers

ROME-TURNEY RADIATOR COMPANY
222 CANAL ST.
ROME, N. Y.

Table 1—Percentage of the Maximum Hour Load

	1	2	3	4	5	6	7	8	9	10
	to	to	to	to	to	to	to	to	to	to
	2	3	4	5	6	7	8	9	10	11
	p.m.	p.m.	p.m.	p.m.	p.m.	p.m.	p.m.	p.m.	p.m.	p.m.
Sensible Heat										
1. Transmission losses	100	100	80	60	40	30	20	10	10	10
2. People	20	50	70	70	50	50	80	100	80	10
3. Lights	100	100	100	100	100	100	100	100	100	100
4. Duct and fan losses	100	100	100	100	100	100	100	100	100	100
5. Ventilation	100	100	100	100	90	80	70	60	50	40
Latent Heat										
6. People	20	50	70	70	50	50	80	100	80	10
7. Ventilation	100	100	100	100	100	100	100	100	100	100

In using Table 1 for this problem we would have as follows:

	Total Percentage For 10 Hours	100% Maximum Load per Hour	
1. Transmission losses	460%	x 50,400	= 231,840 B.t.u.
2. People	580%	x 242,000	= 1,403,000 B.t.u.
3. Lights	1,000%	x 10,200	= 102,000 B.t.u.
4. Duct and fan losses	1,000%	x 30,260	= 302,600 B.t.u.
5. Ventilation	790%	x 89,100	= 703,890 B.t.u.
6. People	580%	x 198,000	= 1,148,400 B.t.u.
7. Ventilation	1,000%	x 66,100	= 661,000 B.t.u.

Total heat gain for the 10 hours = 4,552,730 B.t.u.

50° F. to 60° F. As the water in the tank rises in temperature, the suction temperature of the compressor will also rise, so that when the water is at 50° to 60° temperature, the compressor suction temperature will rise to about 35° F.

At 35° suction temperature, the compressor will have a greater capacity than at 19° F. The greater the capacity, the more motor horsepower is required. Therefore, a compressor should be selected for the hourly capacity at 19° suction temperature, and the motor size to be for the same compressor operating at 35° suction temperature.

In this problem the compressor will have to operate continuously from Saturday evening to Monday evening, while the rest of the week, the compressor will operate fewer hours because of only evening shows. The compressor should be selected on the basis of no more than 20-hour operation for any total day.

4,552,730 B.t.u.

20 hours

The compressor to be selected should have a capacity of 227,637 B.t.u. per hour at 19° suction temperature.

Now assuming that the condensing water is 80° F., and by referring to Chart 5, Chapter 9, we find a compressor capacity of 240,000 B.t.u. at 19° suction temperature, which is slightly over our requirements. This is satisfactory.

The condensing pressure is 127 lbs. and will require 2,100 g.p.h. of 80° condensing water. The power input at this point is 25 kw. per hour. Normally a 25-hp. motor would be satisfactory if the compressor would not have to operate above 19° suction temperature.

Now checking the capacity with the same chart and at 35° F. suction temperature, we find the compressor capacity increased to 360,500 B.t.u. per hour. At this point the condensing pressure will be 131 lbs.; condensing water required is 3,000 g.p.h.; and the power input is 28 kw. which means a 30-hp. motor.

The compressor capacity will vary between 240,000 B.t.u. at 19° and 360,500 B.t.u. at 35° suction temperature. Condensing pressure will vary between 127 lbs. to 131 lbs.; condensing water will vary between 2,100 and 3,000 g.p.h.; and the compressor will be operated by a 30-hp. motor.

(To Be Continued)

Members of the Refrigeration Equipment Wholesalers Association

Your refrigeration parts and supply house in Central New York and Northern Pennsylvania

CENTRAL SERVICE SUPPLY

647 S. Warren Street, Syracuse, N. Y.
209-211 Jefferson Ave., Scranton, Pa.

Phone 5-4000 & 3-0313
Phone 3-4000

TEMPERATURES Made to Order with TYPHOON AIR CONDITIONING

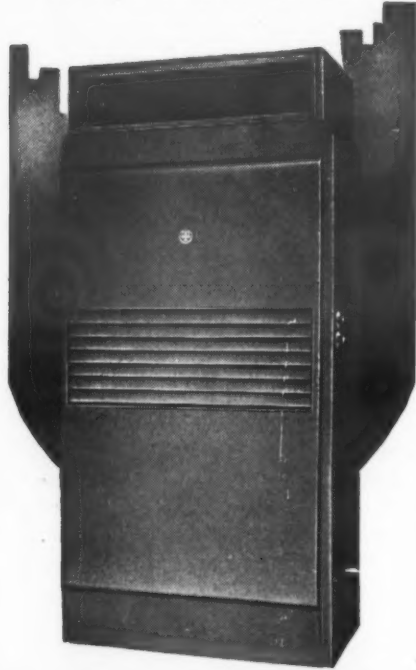
The handsome compact appearance of the TYPHOON self-contained air conditioning unit belies its rugged construction—an engineering achievement backed by over 30 years of practical experience.

Each unit is made to deliver full rated capacity under most difficult conditions—12,000 B.T.U.'s of air conditioning performance for every ton of rating. TYPHOON's exclusive large fan-turn cooling coils and the oversized all-copper condenser, are two of the many features that make for trouble-free performance and maximum customer satisfaction.

TYPHOON UNITS ARE BEING PRESOLD BY NATIONAL ADVERTISING

A few dealer territories are still open

Write for complete information



Complete air conditioning: Cooling, filtering, moisture removal, non-draft circulation—easy to install—low upkeep—3-ton, 5-ton, 7-ton sizes—full rated capacity.

Dept. 212

TYPHOON AIR CONDITIONING CO., INC.
Division of Ice Air Conditioning Co., Inc.
794 Union Street Brooklyn 15, N. Y.

Part of Westinghouse Merchandising Clinic



Pointing out the Built-In-Watchman on a special Westinghouse training model refrigerator is E. J. Hegarty (second from left), sales training manager, Westinghouse Electric Appliance Division. Grouped around him are New England distributor salesmen attending one of the manufacturer's six-day Appliance Merchandising Clinics now in progress at Mansfield, Ohio. Left to right: H. E. Davis, Jr., Mr. Hegarty, R. D. Ellis, J. W. Conway, F. C. Davis, and R. W. Russell.

Philco Home Economists Begin National Program To Educate Consumer In Frozen Food Preparation

PHILADELPHIA — A nationwide program to educate home makers in the proper preparation, freezing, and storage of frozen foods has just been initiated by Philco Corp., with trained home economists assigned to each of the company's divisional sales offices, it was announced by Walter Eichelberger, sales manager of the Philco Refrigerator Division.

Each home economist will arrange educational meetings for women's clubs, and demonstrations with local utility companies and department stores, to meet the widespread demand for practical information on frozen foods. Demonstrations will show how complete meals for the family can be prepared, frozen in a home freezer, and then stored for

future use. The economy and convenience of cooking in one day all the food a family can eat in a week will be stressed.

Philco home economists will show how practically all foods, from pies to tenderloin, can readily be quick frozen. They will point out the economy of buying foods in season, at their peak in flavor and at lowest cost, for frozen storage and consumption months later. They will also emphasize how owning a freezer cuts the housewife's number of shopping trips in half and reduces food waste.

The entire educational program is under the direction of Mrs. Adelaide Fellows, home economist in charge of Philco Home Economics Laboratories at Philadelphia.

Nash-Kelvinator Picks W.F. Poupard To Head New Milwaukee Plastics Div.

DETROIT—Formation of a Plastics Division of Nash-Kelvinator Corp. has been announced by R. A. DeVlieg, vice president in charge of manufacturing.

The company has been experimenting with plastics production machinery for several years, DeVlieg said, and recently converted an existing Nash-Kelvinator plant in Milwaukee to handle this phase of its operation.

W. F. Poupard, who has been in charge of the Nash-Kelvinator plastics program since early in 1946, will supervise the Milwaukee activity. A. E. Karus is factory superintendent.

"Although our plant facilities are in the initial small production stage, we have begun operations with some of the largest and most modern plastic injection molding machines," DeVlieg said. "Our Milwaukee plant is one of the few in the country employing such large equipment."

The plant is already in production on some large plastic parts for Kelvinator refrigerators.

"Like other manufacturers, we of course see tremendous possibilities in plastics," DeVlieg declared. "They provide unusual product eye-appeal and in many instances permit the use of better designs and offer greater color stability. For refrigerators and other appliances, plastics offer better insulating properties, and when selected properly, give excellent performance."

DeVlieg said the activity will be expanded gradually, as circumstances and products requirements warrant. The plant, covering 33,000 sq. ft., now has about 50 employees.

Graham Sells Out Interest In Refrigeration, Inc.

SPRINGFIELD, Mass. — Ray S. Graham has recently announced his resignation as director of Refrigeration, Inc. and the selling of his interest to A. W. Towson who will continue in the wholesale supply business.

At the same time Mr. Graham revealed that he would continue as manufacturers' representative and as head of the Graham Refrigeration Products Co., Inc. in Springfield.

4.3% of Steel Bought In Gray Market, Survey Shows

CLEVELAND — Approximately 4.3% of the steel bought by the nation's steel consumers in the last six months was obtained in the gray market, *The Iron Age*, national metalworking publication, reported recently on the basis of a survey of 1,500 steel consuming companies.

Of the 29% of these companies that answered the magazine's survey, 43% admitted dealings in the gray market.

Recent interviews with steel consumers, the report said, "shows some evidence that the trend in the gray market, for flat-rolled products at least, is turning upward again."

"Efforts to pooh-pooh the seriousness of the gray market are wishful thinking, judging by the statistics compiled as the result of the survey," the magazine declared.

"Hardly any steel customer derives the bulk of his steel from the gray market," the report observed. "In most cases only the tonnages necessary to keep manufacturing operations at high levels to meet competition are purchased at the fantastic prices ultimately charged for steel sheets."

Jahco Starts Making New Light-Duty Unit

CLEVELAND—New light-duty ½-hp. condensing units started rolling off the production line at Jack & Heintz Precision Industries, Inc., here last week.

Two models, the R-50A and the R50B, were designed by Jack & Heintz refrigeration engineers to fall into the light-duty classification to simplify selection of sizes in borderline cases, the manufacturer said. These cover cases where an ordinary "third" might not provide sufficient capacity and a heavy-duty "half" would be impractical from a cost standpoint.

Sales and Inventories During July Drop from Levels Set In June

WASHINGTON, D. C.—July sales and inventories of manufacturers, wholesalers, and retailers were substantially higher than those a year ago but were below the June levels, according to the Department of Commerce.

The department reported that business sales for the month totaled \$33.8 billion, as against \$34.2 billion in June and \$29.1 billion in July last year. It said inventories amounted to \$38.7 billion on the first of the month and \$38.4 billion at the end of the month, compared with \$30 billion at the end of July, 1946.

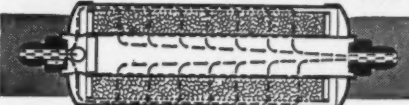
Manufacturers took the greatest sales decrease, about \$500 million to \$13 billion. Durable goods were off \$450 million to \$5.6 billion and non-durable goods \$75 million to \$7.3 billion.

The decrease for retail outlets from June to July was reported as from \$8.7 billion to \$8.5 billion. Durable goods dropped only \$6 million to \$2 billion and non-durables skidded \$190 million to \$6.5 billion.

With non-durables up \$450 million to \$9 billion, wholesale sales increased \$300 million to \$12.2 billion. But durables were off \$150 million to \$3.2 billion.

Manufacturers' inventories increased somewhat by the end of July to \$22.7 billion, but it was the smallest gain—less than \$100 million from the figure for the end of June—in a year. Both durable and non-durable finished goods figured prominently in the rise. Durables were up \$22 million but non-durables were off \$33 million. Wholesale inventories declined \$95 million and retail inventories \$267 million.

REMCO HEAVY-DUTY "CROSS-FLO" DRIER-FILTERS AND FILTERS



UNIQUE "CROSS-FLO" DESIGN eliminates rolling, dusting and packing of drying agent, which eliminates pressure drop, clogging, poor refrigerant control performance and expensive call backs—permits installation in liquid line, suction line or between refrigerant control and evaporator.

Ask Your Wholesaler Or Write
REMCO, INC., ZELIENOPLE, PA.

Is the System Wet? Don't guess—KNOW!

DFN MOISTURE INDICATOR tells instantly

For Freon and Methyl Chloride. Accurate . . . fast . . . inexpensive

See your jobber or write
McIntire Connector Co.
Newark 5, N. J.

For COMPETENT PHOTOGRAPHIC SERVICE in the U. S. and Canada, deal with professional photographic studios which display this emblem.

Get new 1947 Classified Directory free. Lists competent photographers geographically and by name, with key to special services. A big help when you need photographs from out-of-town. A request on your letter-head will bring this 268 page booklet. Write to Charles Abel, Executive Manager, THE PHOTOGRAPHERS ASS'N OF AMERICA, 520 Caxton Building, Cleveland 15, Ohio

see your "DETROIT" WHOLESALER

for
Expansion Valves
Solenoid Valves
Controls

"DETROIT"

DETROIT LUBRICATOR COMPANY General Offices: 5900 TRUMBULL AVENUE DETROIT 8, MICHIGAN

Division of AMERICAN RADIATOR & Standard Sanitary Corporation Canadian Representatives: RAILWAY AND ENGINEERING SPECIALTIES LIMITED, MONTREAL, TORONTO, WINNIPEG

"Detroit" Heating and Refrigeration Controls • Engine Safety Controls • Float Valves and Oil Burner Accessories

"Detroit" Expansion Valves and Refrigeration Accessories • Stationary and Locomotive Lubricators

EXPORT DEPARTMENT—Box 218, Bridgefield, New Jersey

CONDENSING
UNITS
IN
STOCK
1/3-1/2-3/4 H.P.

IMMEDIATE
DELIVERY

REFRIGERATION
AIR CONDITIONING
HEATING
PARTS AND SUPPLIES

SERVICE PARTS COMPANY
2511 Lake St., Melrose Park, Illinois



... the PENN Water Valve

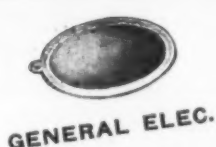
Sedimentation, corrosion and rust have no destructive effects on this water valve. New-type design takes care of that! Water flows in the center section only. It never makes contact with the range spring and sliding parts. Consequently, there is no premature wear and water valve failure. In addition, this PENN 246 eliminates sticking seats and water ham-

mer . . . yet is extremely sensitive to changes in refrigerant head pressure. Send for the free Bulletin on these different and better water valves. Built in threaded and flanged styles . . . in many sizes to meet your specific needs. Penn Electric Switch Co., Goshen, Ind. Export Division: 13 E. 40th St., New York 16, U.S.A. In Canada: Penn Controls, Ltd., Toronto, Ont.

PENN AUTOMATIC CONTROLS
FOR HEATING, REFRIGERATION, AIR CONDITIONING, ENGINES, PUMPS AND AIR COMPRESSORS

HASCO

now makes suction and discharge valve reeds for leading makes of Hermetic units. Look to Hasco for the best in both conventional and hermetic type compressor parts.



GENERAL ELEC.

WRITE FOR ILLUSTRATED CATALOGUE AND PRICE LIST

HASCO, INC.
GREENSBORO, N. C.

Indoor, Outdoor Controls Will Run Heating System At Buffalo Vet Hospital

BUFFALO—Heating of Buffalo's multi-million dollar Veterans Hospital calls for use of a variety of systems, including the utilization of the sun's rays as much as possible, according to Myron C. Beman of the engineering firm of Beman & Candee, consulting engineers for the project.

"In order to accomplish this," Mr. Beman said, "the hospital will be divided into zones for the maintenance of uniform temperature throughout the building."

Mr. Beman explained that when the sun's rays strike the east side of the hospital, automatic temperature controls will lessen the amount of heat fed into that portion through the regular heating system, thereby keeping the temperature constant.

As the sun moves from the east side to the south and west sides, the thermostatic devices will go into action again, increasing the heat to the east side as necessary, and decreasing the flow to the south and west portions of the hospital, as required.

"The north side will not receive the sun's rays and will depend almost entirely on the regular heating system," he said.

The engineer explained that the winds will affect the heating of the hospital in the same manner.

"The auditorium and chapel will operate on the regular heating system when they are to be used, but the temperature will be cut down when they are vacant," he said.

The boilers, which will provide steam heat throughout most of the hospital, will be fired with oil burners. The burners will be automatically controlled to cut down or increase the amount of fuel as the temperature rises and drops.

"The oil, which is heavy and must be kept warm to flow properly, will be stored in eight tanks in an underground room," Mr. Beman said. "Each of the tanks will hold 20,000 gallons, giving the hospital an 18 to 24 days' supply."

Mr. Beman said oil heat will also be used for the laundry, for hot water, for sterilizing instruments, in the air conditioning system, and in the kitchens wherever gas is not used.

Automatic air conditioning is planned for certain parts of the hospital by passing air over coils flowing with chilled water. The temperature of air conditioned rooms will be controlled so as to be proportionate with the outside temperature.

"This is to eliminate the sudden change of temperatures usually noticeable when a person leaves an air conditioned room," he said.

The air conditioning unit will be located on the 12th floor, where fans will pull in the air and pretreat it before passing it along to prescribed rooms. The unit will be on the 12th floor because the upper air is free of dust and other particles.

While all rooms will be equipped with radiators, recessed into the walls and covered by grilles, the operating rooms and laboratories will use radiant heat.

Thermostatic devices will be installed to control water temperatures, Mr. Beman said.

Frigidaire Launches Campaign To Outline Advertising To Dealers

DAYTON, Ohio—When a manufacturer engages in an extensive national advertising program to merchandise its appliances, that's only part of the job.

For a vital obligation of the producer is to follow through his "consumer selling" campaign by a similar one aimed at telling dealers just what's being done.

Such a "follow-through" is currently being undertaken by the Frigidaire Div. of General Motors Corp. Here are some of the things the firm is doing to merchandise its advertising to dealers:

1. Full color sample advertisements are sent along with Frigidaire's house publication going to each dealer and salesman.
2. Current advertisements are furnished for glass-enclosed frames in all district offices.
3. Mimeographed bulletins are sent out to dealers by district offices.
4. Copies of radio commercials are furnished dealers ahead of broadcast.
5. A four-color broadside reviewing the entire advertising program is being sent to dealers.

F. H. Peters, Frigidaire advertising manager, figures the job is one primarily of informing dealers of what promotional materials are available to him. "Like most large advertisers," he remarked, "there are so many facets to our national and local advertising programs that dealers frequently fail to recognize the magnitude of the advertising support they are getting."

Most comprehensive of the information pieces being sent out by Frigidaire is, of course, the broadside. It not only tells what Frigidaire is doing in the field of advertising but also explains why that advertising program is going full-steam.

"Doubtless, all Frigidaire products could have been sold without the factory spending a cent for advertising, and it might not be necessary to spend a cent to move products for some time to come," the brochure admits. "But every day we are getting closer to the time when it will be necessary to sell and sell hard—and factory advertising is a factor right now in building those sales."

Divided roughly into two sections, the broadside explains first what promotional materials are available for dealer use on a local level, and secondly, what steps Frigidaire is taking to promote its products on a national scale.

House of Reinhard Opens New Sioux Falls Quarters

SIoux FALLS, S. D.—New quarters for the wholesale distribution of household appliances were opened by the House of Reinhard at 225 East 11th St. this city, with special showings Sept. 9-10 to which 2,500 dealers in this territory were invited.

Norge refrigerators and other appliances are included among the many franchised products which will be distributed from here. Operated by Reinhard Bros., Minneapolis, the House of Reinhard has been in business since 1902.

6-Volume Series on Store Modernization Published

NEW YORK CITY—Publication of one of the most complete discussions of store modernization problems of recent years is announced by John W. H. Evans, managing director of the Store Modernization Show.

Six volumes comprise the text of all papers read as well as questions and answers at a series of 12 modernization clinics held last July.

Titles of the books are *Modernized Store Lighting*, *Modernized Customer Comfort*, *Modernized Store Layout*, *Modernized Display and Fixturing*, *Modern Use of Materials*, and *Modernized Store Fronts*.

The books are available at Store Modernization Show, 40 East 49th St., New York 17, for \$2 a volume or \$10 for the series of six.

Among the authorities whose discussions are included are Stanley McCandless, lighting professor, Yale university; C. M. Cutler, lighting engineer, General Electric Co.; J. M. Smith, Federal Electric Co.; Russell Dunne, Carrier Corp.; Harold V. Dayton, director, building operations and store planning, Associated Merchandising Corp.; R. L. Paulson,

director, dealer building design division, General Motors Corp.; C. S. Falkenhainer, director, store development division, Rexall Drug Co.; Elmer Reibold, sales promotion manager, Cluett, Peabody & Co.; Dorothy Thomas, Standard Brands, Inc.; Al E. Bliss, president, Bliss Display, Inc.; G. A. Schwartz, H. L. Green & Co.

Elmer Lundberg, director, architectural design department, Pittsburgh Plate Glass Co.; Don P. Caverly, Sylvania Electric Products, Inc.; Kenneth C. Welch, vice president, Grand Rapids Store Equipment Co.; Carroll J. O'Shea, lighting engineer, General Electric Co.; A. N. Barnes, Jr., York Corp.; Richard Belcher, chief store architect, R. H. Macy & Co., and Vernon H. Jones, director, store development and design, Goodyear Tire & Rubber Co.

Architects, industrial designers, and store engineers who participated included Jose Fernandez, Robert Carson, Karl Rosenberg, Victor Gruen, Ken White, Daniel Schwartzman, Morris Lapidus, Morris Sanders, Jedd Stow Reisner, Morris Ketchum, Jr., Charles W. Beeston, J. Gordon Carr, Antonin Raymond, Francis X. Gina, Russell E. Maintain, John Matthews Hutton, George Cooper Rudolph, and Charles S. Telchin.

Preview of Electromaster '48 Range Begins Sept. 29

MOUNT CLEMENS, Mich.—Gerald Hulett, vice president, Electromaster Inc., has announced a series of three preview meetings to present the company's new 1948 electric range models. The meetings will be held at the Detroit Leland hotel.

District managers and field representatives will get their first view of the new models Sept. 29.

Sales department personnel of Electromaster retail outlets in the metropolitan Detroit area will see them in two subsequent meetings.

These meetings mark the first get-together of this group since the company adopted a national distribution program. The Detroit area is the only one in the country where distribution of the company's ranges is made directly to retailers.

Lau Blower Chief Engineer Dies

DAYTON, Ohio—Death of Gordon Kinsman, chief engineer of the Lau Blower Co. here, has been announced by the firm. Mr. Kinsman was buried on Sept. 15 in Johnson City, N. Y., the company declared.

CLASSIFIED ADVERTISING

RATES for "Positions Wanted" \$2.50 per insertion. Limit 50 words.

RATES for all other classifications \$5.00 per insertion. Limit 50 words.

ADVERTISEMENTS set in usual classified style. Box addresses count as five words, other addresses by actual word count.

POSITIONS WANTED

REFRIGERATION AND air conditioning service and installation man. 20 years experience. Commercial domestic low temperatures. Will give best of references. Married have one child. Know the characteristic SO₂ methyl and "F-12." T. S. RABON, 505 Park Avenue, Greensboro, N. C.

SALES TRAINER available: Use services of outstanding trainer and put your own and your dealer's sales force in shape to do a real selling job. Formerly supervisor Sales Analysis Institute, New York—training General Electric, Chrysler, Carrier. Will undertake national program for manufacturer, salary and percentage. BOX 2508 Air Conditioning & Refrigeration News.

POSITIONS AVAILABLE

BUFFALO, NEW YORK. Chrysler Air-temp dealer has fine opportunity for installation and service manager for heating and air conditioning. Well established dealer, L. H. FORD COMPANY, INC., 126 Delaware Avenue, Buffalo 2, New York.

SALES SUPERVISOR required in exclusive Chicago territory. Man selected must have proven ability to supervise and close orders for a team of salesmen. Permanent position where one can earn \$12,000 to \$15,000 with salary and commission. Car required. Call, visit or write KOLD-DRAFT, INC., 321 N. Wells Street, Chicago 10, Superior 3757.

SERVICEMAN—FIVE years experience, who can qualify as instructor in a well established trade school. Must have high school education or equivalent. Good opportunity for a well paid, interesting job with a future. McKIM TECHNICAL INSTITUTE, 25 N. Main Street, Akron 8, Ohio.

SALES MANAGER—Los Angeles distributor for leading line of self-contained air conditioning units and central plants has attractive opening for experienced sales manager of proven ability to handle air conditioning division. Give full particulars when answering. HUGH ROBINSON & SONS, P. O. Box 152, Vernon Station, Los Angeles 11, California.

AIR CONDITIONING and refrigeration service mechanics wanted for "year round" work—must be experienced in servicing Chrysler Airtemp equipment. Two dollars and fifteen cents per hour. SMITH & LOWMAN, INC., 13 Garfield Place, Cincinnati 2, Ohio. Phone MA. 5698.

WANTED—PRODUCTION engineer experienced on refrigerated cabinets. Must have practical experience in sheet metal production, design, welding, assembling, and finishing. New factory central states. Advise experience and salary expected. BOX 2494 Air Conditioning & Refrigeration News.

SALES ENGINEER—Air conditioning or refrigeration—for sunny Southern California. This is an opportunity for man of proven ability and experience in this fast growing industrial area where there is no "off season" in air conditioning or refrigeration. BOX 2498 Air Conditioning & Refrigeration News.

REGIONAL SALES directors with national manufacturer of self contained air conditioning units, condensing units, coils, etc., for Central, South-Eastern and South-Western territory. Air conditioning background and experience essential. Position covers engineering and sales promotional work with dealers and distributors. Give full particulars with recent snapshot. BOX 2505, Air Conditioning & Refrigeration News.

REFRIGERATION SALES engineer—experienced. Exceptional proposition with an old established wholesale firm in Ohio handling well advertised, nationally known brands on exclusive basis. A real

opportunity for a man interested in a position that will yield him excellent earnings. BOX 2506 Air Conditioning & Refrigeration News.

MIDWEST JOBBER 25 years in refrigeration wholesale needs territory salesmen. Salary, expenses and commission. Chance to get ahead. BOX 2511 Air Conditioning & Refrigeration News.

REFRIGERATION & SALES engineer—College graduate must have complete knowledge and experience in commercial and industrial air conditioning and refrigeration—ammonia and "Freon." Experience must include actual installation, estimate and sales. Written application giving full details as to experience, age, etc. Salary and commission. BOX 2513 Air Conditioning & Refrigeration News.

PART TIME refrigeration engineer wanted to do experimental work, nights and Saturdays, on various chemical problems related to refrigeration. Work consists of some research, testing and report writing. Locale: Newark, N. J. BOX 2515 Air Conditioning & Refrigeration News.

FAST GROWING refrigeration company requires services of A-1 refrigeration man, engineering ability to assist in experimental work. Not afraid of hard work. Experienced on absorption system helpful. Wonderful opportunity for advancement. Write BOX 2516 Air Conditioning & Refrigeration News stating age, experience, salary expected.

SALES REPRESENTATIVE: For Philadelphia firm to handle complete line of Ice Plant Supplies. Experienced man with following covering ice plants. Excellent opportunity. Liberal commissions. Write full details. Replies treated in confidence. BOX 2517 Air Conditioning & Refrigeration News.

EQUIPMENT WANTED

COUNTER FREEZERS wanted for resale: Used freezers, 1½, 2½ and 5 gallon sizes, in good condition. Prefer Taylor but will accept Basitan Blessing also. No others considered. Write make, size, age, condition and price to BOX 2512 Air Conditioning & Refrigeration News.

EQUIPMENT FOR SALE

MOTORS AND condensing units—available at once—¾-¼-½-¾ Universal condensing units with or without motors. Special—six hole ice-cream cabinets with ¼ hp. Copeland units less motors \$225. Also beverage coolers, beer equipment, stainless steel reach-in freezers. ALBROD CORP., 319 West 48th St., New York City 19, CI 6-9100.

SELLING OUT: used (as is) and rebuilt Frigidaire and Kelvinator condensing units with new s. ph. capacitor motors. Write for list. EDISON COOLING CORP., 310 E. 149th Street, Bronx 51, N. Y.

EXCESS INVENTORY of brand new compressor and condensing units priced far below cost. All in original crates. "Freon" type 208/3/60 complete. Also few motors, starters, self-contained air units and freezer doors. E. M. FAIRBANKS, 145-03 Seventh Avenue, Whitestone, L. I., N. Y.

FOR SALE: 4600 F. A. Smith motors. Model 6A5L58J. Open type, 115V, 60 cycle, 1550 RPM, with 5/8" diameter by 1½" long shaft, minimum length studs ¾" NEMA CCW rotation. Inquiries should be addressed to FEDERS-QUIGAN CORPORATION, Attention B. R. Thomson, 57 Tonawanda Street, Buffalo 7, New York.

QUALITY BOBTAIL fountains; reach-ins, walk-in boxes—wood, metal; dough retarders; double duty cases—stainless steel, porcelain; dairy, florist, bakery cases; ice cream hardening cabinets; thermopane frozen food cases; milk, sandwich coolers; stainless steel back bars; with machines. Equipment made to special order. FRIGITEMP CORP., 931 Bergen St., Brooklyn 16, MA 2-9093.

FIVE, 5 HORSE Curtis packaged air conditioners. Brand new in crates. At dealers price. Write: FROSTLINE REFRIGERATION CO., 209 South Main, Fond du Lac, Wisconsin.

1000 MOTORS, FOR sale, from stock ¾ hp.—3425 RPM—3 ph/230 V. (Under-rated—easily equal to ¾ hp.) Ballbearing, for vertical or horizontal. Enclosed Fr. ¾ in. shaft. \$30 each. This rugged motor cannot burn out. (Glass insulated wire coils.) MODERN SUPPLY CO., 206 Fulton St., New York 7—CO 7-0100.

SACRIFICING BRAND-new Copeland and Universal condensing units in original crates. ¾, 1, 1½, 2 HP air-cooled, 1½ and 3 HP water-cooled. All priced for immediate clearance. Write or wire now. ROCHELLE REFRIGERATION COMPANY, 31 East 4th Street, New York 3, N. Y.

SEALED CROSLLEY TERMINALS. Installed from the outside in a few minutes without opening the compressor. Corrects leaky terminals on all Crosley "F-12" units. Set of three \$5.25 (Part No. 1020). Installation tool 20¢. Immediate delivery. Money-back guarantee. SEALED UNIT PARTS CO., 3097 Third Ave., New York 56, N. Y.

AS IS units available—¾ HP \$10; 1-½—\$15; 2-½—\$20; 1 HP \$25. (Less motors) Frigidaire, Kelvinators, Servels, etc. Also water-cooled and air-cooled. These prices FOB N. Y., uncrated. Also 3 HP Copeland 3 cylinder machines. Can supply new machines all sizes, water and air-cooled. SIMON'S REFRIGERATION, 763 First Avenue, New York 17, N. Y.

BAKER-UNIVERSAL air-cooled 3 HP, 3 phase, 220 volt, 60 cycle "Freon-12" condensing unit complete with starter and in original crate. Model 300-FS. \$400. VANCE EQUIPMENT COMPANY, 1003-05 South Oates Street, Dothan, Alabama.

UNIVERSAL, WATER cooled, 2 HP condensing units, complete with Century and Westinghouse motors, starters, valves. Units are new and in original crates. \$325 FOB Dothan, Alabama. Model W-200-FS. Single-phase 110/220 motors. VANCE EQUIPMENT COMPANY, 1003-05 South Oates Street, Dothan, Alabama.

YORK COMPRESSOR—9 x 9 with 100 HP motor, ammonia receivers, condensers, pumps, switches and gauges; one 4½ x 4½ vilter compressor complete as above; one 25 ton vilter Briquelette machine complete; all above in running order; may be seen at plant or write for further details. WAVERLY GROWERS CO-OPERATIVE, Waverly, Florida.

¾ HP UNITS complete with motor. \$38.50. Other models from ¼ HP to 1 HP at new low prices. All units supplied with motors. Send for catalog 742A. BOX 2405 Air Conditioning & Refrigeration News.

CAPILLARY TUBE overstock. Up to 7500 lbs., .050 ID x .032 wall plus or minus .002. Soft temper copper capillary tubing. Random coils 50 to 100 ft. Sealed ends. BOX 2487, Air Conditioning & Refrigeration News.

BUSINESS OPPORTUNITIES

WELL ESTABLISHED electric retail appliance company. Leading franchises. Good lease. Located in Florida's leading city. BOX 2491 Air Conditioning & Refrigeration News.

SACRIFICING FOR wholesale cost established commercial refrigeration, store fixture business, principally a sales organization, holding valuable franchises both commercial refrigeration equipment, store fixtures. Sale also including most popular appliance franchise in town having unlimited possibilities. \$10,000 down payment, balance can be financed on suitable terms. Located Indiana, little competition. BOX 2502 Air Conditioning & Refrigeration News.

EASTERN MANUFACTURER specializing in air conditioners, room coolers, freezers, ventilators and fabrication of all types of sheet metal work has open time on most plant facilities. Presses up to 100 tons. Inquiries with full details are invited. BOX 2514 Air Conditioning & Refrigeration News.

Subscribe Now

Receive the greatest trade paper in the Industry—AIR CONDITIONING & REFRIGERATION NEWS. Published every week. Brings you latest news and vital information on household refrigeration, commercial refrigeration, air conditioning, home freezers; manufacturing, distributing, retailing, servicing, and contracting. Only \$5 per year, 52 issues.

Fill in coupon and mail today

AIR CONDITIONING & REFRIGERATION NEWS
450 West Fort Street, Detroit 26, Mich.

Gentlemen: Send the NEWS for one year.

☐ \$5 enclosed ☐ Bill me ☐ Bill the company

Name

Company

Street

City

Zone

State

9/29/47

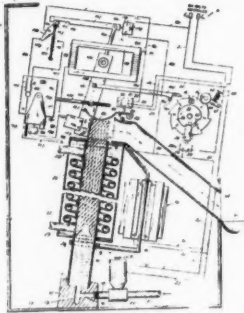
PATENTS

Week of June 24

2,422,709. REFRIGERANT AND METHOD OF MAKING. Sol B. Wicker, Washington D. C. No Drawing. Application June 1, 1945, Serial No. 597,163. 5 Claims. (Cl. 252-67.)

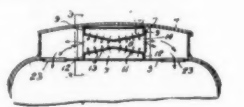
1. Method of forming a solid refrigerant comprising homogeneously mixing with attrition a major portion of water ice and a minor proportion of solid CO₂.

2,422,772. ICE CUBE DISPENSER. Donald I. Bohn, Pittsburgh, Pa. Application Nov. 11, 1944, Serial No. 562,925. 19 Claims. (Cl. 62-2.)



2. An ice cube dispenser comprising means for freezing a column of fluid; means for moving said frozen column in one direction; and a cut-off member for cutting off sections of said column as it moves in said one direction; and manually operated switch means for initiating the operation of said column moving means; and a connection between said cut-off member and said manually operated switch means to re-set said switch to neutral position on completion of the cutting operation; means for setting said switch means for a predetermined number of cubes; said re-setting connection operating said switch means step by step to neutral as to the predetermined number of cubes is cut.

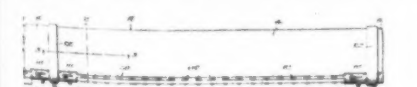
2,422,782. OVERHEAD AIR DISTRIBUTING DUCT FOR VEHICLES HAVING MEANS FOR MIXING COLD AND REGULATED AIR. Harold Hemming, Dedham, Mass., assignor to B. F. Sturtevant Co., Hyde Park, Boston, Mass. Application Sept. 28, 1944, Serial No. 555,793. 3 Claims. (Cl. 98-10.)



1. An air conditioning system for an area to be conditioned, said area having a ceiling, comprising a pair of superimposed aligned ducts enclosed in the space above said ceiling, the upper of said ducts having a lower wall spaced above the upper wall of the lower of said ducts, means for chilling air, means for supplying the chilled air, under pressure, into one of said ducts, means for supplying air recirculated from the space served with conditioned air, under pressure, into the other of said ducts, said walls having a plurality of apertures formed therein for projecting air from said ducts into the space therebetween, and means forming outlets in said ceiling on opposite sides of said ducts and extending parallel thereto for distributing into said space, the mixed air from said ducts.

Week of July 1

2,423,241. AIR DISTRIBUTING DUCT, INCLUDING A DAMPER MEANS. Franz J. Kurth, Friedrich Honerkamp, and Herbert K. Kunen, New York, N. Y., assignors to Anemostat Corp. of America, New York, N. Y., a corporation of Delaware. Application June 5, 1943, Serial No. 489,826. 5 Claims. (Cl. 98-40.)

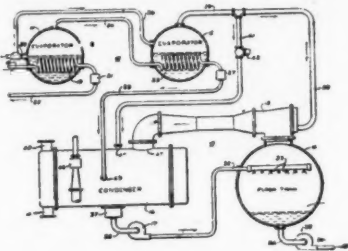


1. Ventilating apparatus comprising an air supply duct having therein a plurality of air outlet openings arranged in rows spaced apart transversely of the duct and extending longitudinally therealong, means to cause the air streams discharged from the duct through the openings of the respective rows to flow from the duct in diverging relationship to each other transversely with respect to the duct, a slide-piece individual to and aligned with each row of said openings and having therein a row of openings corresponding in number and spaced apart relationship to the openings of the related row in the duct, and means mounting each slide-piece against the duct for longitudinal sliding movement relative thereto to align and disalign its openings with and from the openings of the related row in the duct, thereby to vary the effective areas of the latter openings.

2,423,307. STEAM JET REFRIGERATION APPARATUS. Walter G. Fraser, Jr., Prospect Park, and George C. Taylor, Bala-Cynwyd, Pa., assignors to Westinghouse Electric Corp., East Pittsburgh, Pa., a corporation of Pennsylvania. Application Jan. 16, 1945, Serial No. 573,025. 12 Claims. (Cl. 62-152.)

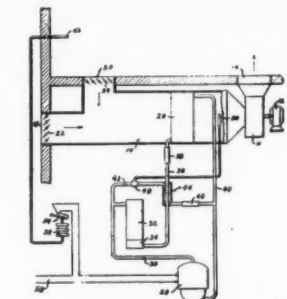
1. In a distillation and steam jet refrigeration system, the combination of an evaporator for vaporizing liquid, means for supplying heat to said evaporator to vaporize the liquid therein, a flash tank adapted to contain liquid to be cooled, means for removing vapor from said

flash tank to effect cooling of the liquid therein, said vapor removal means being motivated by vapor generated in said evaporator, a condenser for condensing the vapor generated in said evaporator



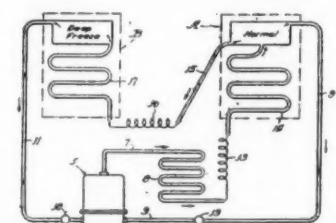
and the vapor removed from said flash tank, and means for supplying all of the condensate from said condenser to the flash tank for cooling.

2,423,382. CONTROL FOR AIR CONDITIONING SYSTEMS. Charles D. Graham, Dayton, Ohio, assignor to General Motors Corp., Dayton, Ohio, a corporation of Delaware. Application Nov. 20, 1943, Serial No. 511,079. 15 Claims. (Cl. 62-3.)



1. In a refrigerating system, evaporator means, means for flowing air in thermal exchange relationship with said evaporator means, condenser means, refrigerant compressor means for withdrawing vaporized refrigerant from said evaporator means and for discharging compressed refrigerant into said condenser means, fixed restrictor means controlling the flow of refrigerant from said condenser means to said evaporator means, and means for by-passing refrigerant from a point ahead of said fixed restrictor to a point beyond said evaporator means in response to a decrease in the temperature of the air leaving said evaporator means.

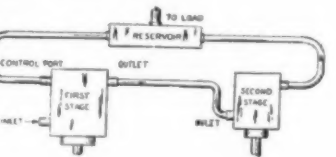
2,423,386. TWO-TEMPERATURE REFRIGERATING SYSTEM. Earl F. Hubacker, Highland Park, Mich., assignor to Borg-Warner Corp., Chicago, Ill., a corporation of Illinois. Application Feb. 21, 1944, Serial No. 523,280. 6 Claims. (Cl. 62-115.)



1. A two-temperature refrigerating system comprising, in combination, a compressor, a condenser into which compressed refrigerant is discharged from said compressor, a first evaporator, a second evaporator, a refrigerant restrictor means connected to and disposed between said condenser and said first evaporator and having a passage of relatively small cross-section therethrough for said refrigerant, said first evaporator being adaptable to vaporize, a portion of said refrigerant received by it, vapor conduit means connected between said first evaporator and said compressor whereby said vaporized portion of said refrigerant will be conveyed from said first evaporator to said compressor, check valve means interposed in said last mentioned conduit means adaptable to prevent oil or extraneous matter from working up into said first evaporator, refrigerant conduit means connected between said first evaporator and said second evaporator adaptable to convey to said second evaporator the remaining liquid refrigerant in said first evaporator, said last mentioned refrigerant conduit means including a restrictor means having a relatively small cross-section therethrough for said refrigerant, said second evaporator being adaptable to vaporize said liquid refrigerant received by it, vapor conduit means connected between said second evaporator and said compressor whereby said vaporized refrigerant in said second evaporator will be conveyed to said compressor, and check valve means interposed in said last mentioned conduit means adaptable to reduce reexpansion volume of the refrigerant to a minimum.

Week of July 8

2,423,677. COMPRESSOR PRESSURE CONTROL. Roy O. Balogh, Cleveland, Ohio, assignor to The Weatherhead Co., Cleveland, Ohio, a corporation of Ohio. Application Feb. 2, 1946, Serial No. 645,191. 4 Claims. (Cl. 230-21.)

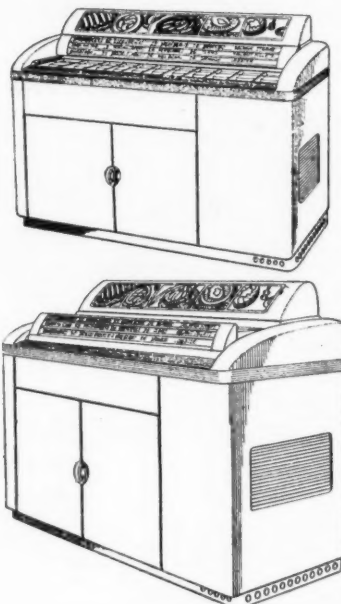


1. In combination in a compressor, a reciprocating piston and a cylinder, a movable member cooperating with said piston and cylinder to form the clearance volume of said cylinder, said movable

member having an inlet port and a check valve therein, said movable member also having means arranged for communication with an exhaust port in said cylinder at all positions of said movable member, said movable member being spring loaded to reduce the clearance volume, said movable member being subjected to fluid pressure to increase said clearance volume, the relation of the inertia of said movable member, the force of said spring and the piston speed being such that said movable member makes only a partial stroke during a cycle.

DESIGNS

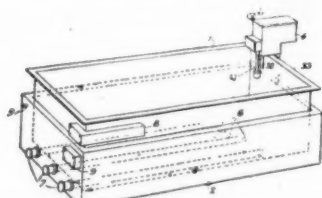
147,086. DESIGN FOR A FROZEN FOOD DISPLAY CABINET. Daniel Robertson, Brantford, Ontario, Canada, assignor to Universal Cooler Co. of Canada, Ltd., Brantford, Ontario, Canada, a corporation of Canada. Application June 30, 1945, Serial No. 120,442. Term of patent 14 years. (Cl. D80-11.)



The ornamental design for a frozen food display cabinet, as shown and described.

Week of July 15

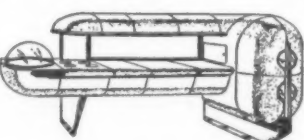
2,424,133. LIQUID LEVEL AND TEMPERATURE CONTROLLER. William Alcock, Jr., Kingsbury, London, England, assignor to Fescol Limited, London, England, a company of Great Britain. Application Sept. 14, 1944, Serial No. 554,016. In Great Britain Sept. 22, 1943. 7 Claims. (Cl. 257-4.)



1. In apparatus of the kind hereinbefore referred to and comprising a tank adapted to contain liquid which is subject to variations of temperature and loss of level, a liquid heat exchanger in heat exchange relation with said tank, liquid level and temperature control mechanism comprising a valve for controlling a supply of liquid to said tank and heat exchanger, means acting under the influence of a deficiency in the liquid level in said tank for actuating said valve so as to cause make-up liquid to be supplied to said tank, and means including two thermostats, one associated with the liquid in said tank and the other with the liquid in said heat exchanger, for actuating said valve so as to cause liquid to be supplied to said heat exchanger according to variations in the temperature of the liquid in said tank and that in said heat exchanger.

DESIGNS

147,141. DESIGN FOR A COMBINATION KITCHEN UNIT. Joseph Oros, Inkster, Mich. Application Sept. 24, 1945, Serial No. 122,270. Term of patent 3 1/2 years. (Cl. D33-13.)



The ornamental design for a combination kitchen unit, substantially as shown.

147,149. DESIGN FOR A FROZEN FOOD CABINET. Milton Rifkin, Chicago, Ill., assignor to Frez-O-Mat Sales Corp., Chicago, Ill. Application March 26, 1946, Serial No. 127,976. Term of patent 14 years. (Cl. D80-11.)



The ornamental design for a frozen food cabinet, as shown.

Takes New Sales Post



RONALD GRAY

Artkraft Appoints Gray Southeastern Manager

LIMA, Ohio — Appointment of Ronald Gray as southeastern sales manager for Artkraft Mfg. Corp. has been announced by T. O. Warfield, vice president and sales manager.

Mr. Gray's territory will include Virginia, North and South Carolina, Georgia, Florida, Alabama, Mississippi, Louisiana, and Tennessee with the exception of Memphis.

3 Service Supervisors Appointed by Bendix

SOUTH BEND, Ind.—Three service supervisors have been appointed by Bendix Home Appliances, Inc., according to A. P. Smith, national service manager. They are: Eldon T. Jones of Niles, Mich., Kansas City, Mo., territory; R. C. Perkey, South Bend, unassigned, and Loy D. Jones, ironer specialist, home office.

Butler, Lacy Named G-E Laboratory Engineers

BRIDGEPORT, Conn.—Edmund J. Butler and Robert M. Lacy have been appointed assistant engineers of the General Electric Co.'s Bridgeport works laboratory, it has been announced by I. C. Eaton, laboratory engineer.

Mr. Butler, who was formerly assistant to the engineer in charge of the laboratory, has been with G-E 23 years.

Dr. Lacy joined the company at Schenectady, N. Y., in 1942, was soon transferred to Bridgeport where he was most recently in charge of the chemical section of the works laboratory.

Evans Heads Sales For St. Petersburg Contractor

ST. PETERSBURG, Fla.—Sterling E. Evans has been appointed sales manager and engineer in charge of the heating and air conditioning department of the Boyett Roofing & Sheet Metal Works, Inc., S. L. Boyett, general manager, has announced.

Mr. Evans will develop his own engineering and sales staff, Lamar E. Boyett will be identified with this branch of the business.

O. G. Thompson Named President Of San Diego Appliance Bureau

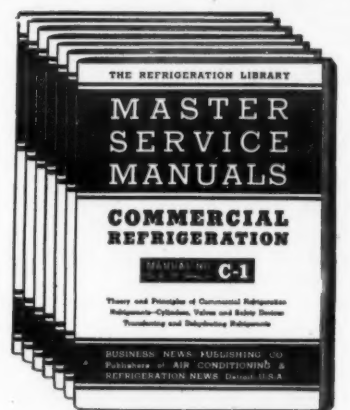
SAN DIEGO, Calif.—The Bureau of Radio and Electrical Appliances of San Diego County has announced the results of its recent election of officers and directors.

O. G. (Tommy) Thompson of G-E Supply Corp. was elected president; Robert L. Swearingin, El Cajon Supply Co., first vice president; Archie Marsden, G-E Appliance Corp., second vice president; and Sam L. Hall, Electric Supplies Distributing Co., treasurer. Mr. Thompson, who is local manager of the G-E Supply Corp., succeeds Lou C. Wiese.

COMMERCIAL REFRIGERATION

Thousands of refrigeration men have ordered these useful books.

See them at your nearest parts wholesaler



COMMERCIAL REFRIGERATION

by K. M. Newcum

MANUAL NO. C-1—The theory and principles of refrigeration presented in a more complete manner than in household manuals. Properties of refrigerants, including effect on lubricating oils. Types of refrigerant cylinders, valves, and safety devices. Methods of drying and transferring refrigerants. 96 pages. 59 illustrations. 10 tables. Price \$1.00.

MANUAL NO. C-2—Installation and service methods. Detailed information on commercial condensing units and their component parts. Water regulating valves, both electric and pressure-actuated types. Flooded evaporators and low side float valves. Two-temperature flooded systems. 112 pages. 108 illustrations. Price \$1.00.

MANUAL NO. C-3—Installation and service methods continued. Chapters on expansion evaporators, including blower units and all modern types. Thermostatic and temperature controls. Refrigerant control valves. Electric motors, starters, overload relays. 144 pages. 116 illustrations. 7 tables. Price \$1.00.

Business News Publishing Co.

450 W. Fort Street

Detroit 26, Michigan

Plans Chain of Reconditioning Shops--

(Concluded from Page 1, Column 4)
Market Report, a trade-in manual. Amplifying further his announcement about the chain of reconditioning firms, Mr. Hantober added that the company has already been incorporated as Hantober & Co. Location of the first unit in the group will be 200 E. Church Lane, Philadelphia. A one-story building, at this address covers an area of 10,000 sq. ft. and will provide three loading platforms. Mr. Hantober estimated that some 50 persons would be employed at the plant.

A second plant will be opened in Los Angeles and a third in Chicago, he said, but the location and date of opening for these two have not as yet been determined. Plans for the remainder of the chains are still in the embryonic stage.

TO CONTACT MANUFACTURERS

Right now Mr. Hantober is primarily concerned with plans for a joint meeting with refrigerator manufacturers which he hopes will be held during November. At this session Mr. Hantober will outline his program for reconditioning refrigerators and explain how the overseas shipment of used models will expand the market for new household units.

Idea for establishment of the first Hantober plant in Philadelphia resulted, Mr. Hantober says, from a direct request of the Electrical Association of Philadelphia through its managing director, John A. Morrison. Operation of the Associated Refrigerator Plant there before the war met with such success that dealers and distributors in Philadelphia asked that it be re-opened, Mr. Hantober claims.

Generally speaking, the functioning of Hantober, Inc., will be similar to that of its antecedent firm. Used refrigerators for reconditioning will be obtained from dealers, department stores, and utilities. The firm with the used household unit will have the choice of selling the refrigerator to Hantober outright at 50% of the "blue book" listing, or paying Hantober a flat fee for reconditioning. (Such a fee eight years ago amounted to \$20 per refrigerator.) In the latter case the dealer would ultimately resell the reconditioned refrigerator to the consumer.

Mr. Hantober recalled from his prewar experience with trade-ins that nearly all the dealers preferred to sell the used refrigerators outright.

THE PLAN OF EXPORTING

This veteran of the trade-in field has a feeling that his plan for shipment of reconditioned refrigerators to foreign countries will have a stimulating effect on the market for new household units.

"Out of all the refrigerators that will be traded in during the next three years (these will total several million) there is no doubt in my mind that at least 50% will have to be junked," he commented. "The other 50% will be reconditioned and should be sold out of this country. This will enable dealers to sell more new refrigerators instead of second-hand ones."

Citing figures to bolster this statement, Mr. Hantober declared that there are approximately 12,500,000 old refrigerators now in use, including 1939 and 1940 models. Out of this number he estimated that between four and five million are at least 12 years old.

As for the industry's present capacity to produce new refrigerators, Mr. Hantober would place the potential at about seven million annually. Demand for these new models, he felt, however, could absorb only three million without trade-ins being involved in the sales.

MARKET FIVE TIMES GREATER

That, emphasized Mr. Hantober, is where his reconditioning-for-export plan comes in. It will keep most of those reconditioned refrigerators from returning to the American consumer market to compete with new units.

He forecast that five times as many refrigerators would be traded in during the next few years as were before the war.

In an effort to work out a sales-distribution program for reconditioned refrigerators in South America, Mr. Hantober is planning a trip there within the near future. He figures that South America will provide the principal market for such units.

When asked what he thought of the restrictions on appliance imports now in force among many of the

South American countries, Mr. Hantober replied that he felt they would be either eliminated or modified before very long.

The Associated Refrigerator Plant, which Mr. Hantober headed between 1938-43, generally employed about 100 persons. Between Oct. 1, 1938 and July 31, 1939 the plant handled 2,910 used refrigerators. Of this number 836 were junked, 590 reconditioned for dealers, 1,309 sold to dealers and department stores. The remainder was kept at the plant.

Up to 1941, Mr. Hantober said, Associated Refrigerator Plant received trade-ins for reconditioning from many sources, including utilities in Reading, Harrisburg, Altoona, and Pittsburgh, Pa. as well as those in Detroit and Wheeling, W. Va.

Calif. Dairies' Law--

(Concluded from Page 1, Column 3)
for the purpose of setting up new equipment-rental schedules.

Mr. Jones reported that he and a member of a special committee participated in a round-table discussion of the law at the quarterly meeting of the Dairy Institute. The discussion was led by W. B. Woodburn, chief of the market enforcement division, and representatives of various dairy and ice cream interests.

"We understand that sectional meetings are now being held at several points in the State with the ice cream industry, and as soon as these meetings have been completed, we will arrange a meeting with the Dairy Institute and the Department of Agriculture to discuss the new law," Mr. Jones announced.

Commenting on the law, the Na-

tional Association of Refrigeration Contractors said it removes "one of the worst sources of difficulty confronting contractors."

"Our affiliated association of Northern California . . . had a lot to do with this legislation," NARC declared. "It proves what can be done by contractors working together through an organized group, fighting for their rights and sticking to it until a victory is assured."

Paullin Co. Formed To Handle New and Rebuilt Equipment

BUFFALO—Edward M. Paullin, former assistant manager of the compressor division of the Worthington Pump & Machinery Corp., has announced the formation of the Paullin Equipment Co., Inc. to deal in new and rebuilt mechanical and electrical equipment.

Some Applications for Gas Heat Stop In Pittsburgh

PITTSBURGH—Delays in delivery of steel pipe and other equipment required to expand transmission and distribution systems were given as the reason why two utility companies here have stopped granting applications for new central heating equipment which is designed to use natural gas fuel.

The two concerns, Manufacturers Light & Heat Co. and Peoples Natural Gas Co., added that, in addition to the delays, the demand for natural gas has been unusually heavy.

Equitable Gas Co., another natural gas organization serving this area, was reported to be considering similar action, although no announcement has yet been made.



BUSH CONTRACTORS DON'T HAVE TO SWEAT

BUSH

OUR FORTIETH YEAR

Bush contractors don't have too many worries . . . don't have to sweat over figuring a job. For Bush has a nationwide organization of factory representatives . . . trained refrigeration engineers who can quickly work out the requirements of any installation and advise on every detail of equipment, operation, and maintenance. *They* do the sweating . . . *you* can go fishing.

These Bush representatives are always ready to help you put the right Bush equipment into every job. And, because it's Bush equipment . . . has 40 years of engineering skill behind it . . . you can be sure it is correctly designed, conservatively rated, ruggedly built. You can be sure it will give years of trouble-free service.

Sold by leading refrigeration wholesalers everywhere

HEAT TRANSFER PRODUCTS • BUSH MANUFACTURING COMPANY • HARTFORD, CONN.

415 LEXINGTON AVE., NEW YORK • 549 W. WASHINGTON BOULEVARD, CHICAGO, ILL. • EXPORT ADDRESS: 13 EAST 40th ST., NEW YORK, N. Y. • CABLE "ARLAS"